



SUBSCRIPTIONS ARE INVITED FOR THE ISSUE OF 22,350 FIFTEEN PER CENT. PREFERENCE SHARES OF £1 EACH IN THE  
GENERAL BRAZILIAN MINING COMPANY  
(LIMITED).

Being the balance of the authorised issue of 30,000 Preference Shares, making the capital of the company £20,000. Applications to be made in the form annexed to the prospectus.

To the Imperial Bank (Limited).  
Payment as follows:-

2s. per share on application.

3s. " allotment.

The above capital is required for the purpose of completing the adits now in progress for draining the old workings at the Santa Anna and Itabira Mines.

The length of these adits is about 124 and 255 fathoms respectively, and, as will be seen on reference to the plan of the mines (which can be had on application), 71 fathoms have already been driven at the Santa Anna Mines, and 305 fathoms at the Itabira Mine.

At Itabira fourteen and at Santa Anna ten shoots have been traced as having been worked by the former proprietors.

Many, perhaps most, of these lines of gold have been excavated down to water level, but one line which was struck by the company 150 fathoms above water level, yielded in October last, by hand treatment only, 1,000 oztas of gold, and a Brazilian factor in the company's employ, who knows the mines well, believes the same to be entire below where touched by the company, whilst satisfactory indications of new shoots have also been discovered.

One stamping mill of 12 heads is finished, whilst another of twelve heads is nearing completion.

Shafts have already been sunk at both mines, and the necessary buildings erected for treating large quantities of ores, and it is fully anticipated that in a few months the mines will be yielding good returns of gold.

Forms of application for shares can be had on application at the Imperial Bank (Limited), London; of Messrs. WILKINS, BLYTH, and MARSLAND, the solicitors of the company; of Messrs. J. BRAMLEY MOORE and Co., Liverpool, the agents of the company; and at the company's offices, 52 Moorgate-street, where plans of the mines and full particulars can be obtained.

THE CARDIGANSHIRE OLD BOG MINE  
(LIMITED).

Incorporated under The Companies Acts, 1862 and 1867.

Capital £30,000, in 12,000 Shares of £2 10s. each.

£2 10 per share to be paid on application.  
1 0 " " allotment.  
1 0 " one month after allotment, when all liability will cease.

£2 10 Where no allotment can be made the deposit will be returned without delay.

DIRECTORS.

JAMES FILDES, Esq., 44, Spring gardens, Manchester.

E. H. LOWE, Esq., Shrewsbury.

J. F. BINKS, Esq., 44, Queen's-road, Peckham, Surrey.

S. HARLEY ROUGH, Esq., Shrewsbury and Church Street.

BANKERS.

Messrs. ROCKE, EYTON, and CO., Shrewsbury,

THEIR LONDON AGENTS.

Messrs. ROBARTS, LUDDOCK, and CO., Lombard-street.

ARCHIBALD SMYTH, Esq., Throgmorton-chambers, London, E.C.

OFFICE OF REFERENCES.—30, GREAT ST. HELEN'S, LONDON, E.C.

SECRETARY—Mr. E. CAVENDISH TAHOURDIN.

REGISTERED OFFICES.—CLAREMONT STREET, SHREWSBURY.

PROSPECTUS.

This company is formed for the purpose of acquiring and working the celebrated Cardiganshire Old Bog Mine, situate in the parish of Llanbadarn-fawr, in the county of Cardigan, and in one of the most productive zones of that richly metalliferous district—a district which has been worked for a long period and to greater profit than any other in the Principality.

The sett is a very extensive one, having a run of upwards of 500 fathoms on the course of the lodes. It is bounded on the east by the River Rhedol, and on the south and south-west by Clara Consols and Llywernog Mines, and is immediately contiguous to many other important mines, one of which, in close proximity, and known as Powell United, has recently been purchased for £18,000.

The geological position of the grant is everything that could be desired for the profitable production of lead ore.

The stratum is in the clay-state of the Lower Silurian formation, which according to the experience of the district is found to carry the largest and richest veins—here exhibiting a massive bedding, in consequence of which it appears that the veins increase in width, expanding in some cases to 20 feet.

Many well-defined veins bearing nearly due east and west traverse the sett, and are crossed by others having their direction about north-west and south-east, which form several important junctions, where large deposits of ore will most probably be found, judging by experience gained in similar instances in the district.

Two lodges have been explored to some extent by means of shafts; one to a depth of 40 fathoms, and the other, more recently, has been sunk on for about 9 fathoms.

From the deepshaft, and the workings in connection with it, large quantities of lead ore have been raised by former workers, and from the new shaft, which is sunk in a pipe of ore from surface, a quantity of lead was produced, some of which is to be seen on the ground at the present time.

It is now found necessary to erect pumping and other machinery in order to continue the working of the mine in an efficient manner, and it is confidently anticipated that with adequate means to carry out its proper development the Cardiganshire Old Bog Mine will speedily realise the strong promises of success afforded by results obtained from the shallow workings already executed.

The natural advantages of the sett form a very important element in the anticipations entertained as to the ultimate success of its full development. The configuration of the ground is so peculiar as to allow of very extensive explorations in virgin ground which can be done by means of adit levels being driven at a comparatively trifling expense.

There is an ample and continuous supply of water, which might at any time be increased to an unlimited extent, and, at a small cost, by forming a connection with the River Rhedol, which is the eastern boundary of the sett.

This mine is also excellently placed for the carriage of ores and materials, being only 1½ miles from the port of Aberystwith, to which there is an excellent turnpike road.

The property is held under lease, dated the 31st day of December, 1868, from Sir Pryce Prys, Bart., for 21 years at 14th royalty.

The only contract entered into is one dated 10th October, 1871, between Samuel Jacks of the first part, and Alfred Layton of the second part, whereby the company acquires all the interests of the vendor for the sum of £135 0, of which £6 00 is to be paid in cash by instalments, and £7 00 in fully paid-up shares.

Further particulars of the property will be found in the reports written by authorities conversant with the locality.

Applications for shares must be made, accompanied by the deposit of 10s. per share, on the form annexed to the prospectus, and can be sent either to the bankers, broker, or the secretary at the Lou or Shrewsbury offices of the company, from whom prospectuses, with reports and plans, can be obtained.

Board Room, 28th November, 1871.

THE COMMERCIAL AGENCY OF BRAZIL,  
LEADENHALL STREET, LONDON, E.C.

Undertake the PROMPT EXECUTION of all ORDERS for the PURCHASE OF BRAZILIAN PRODUCE, and the PURCHASE of GOODS in all European markets.

The sale in Brazil, South America, England, India, and Spain of all consignments of produce, goods, earthenware, machinery, railway and telegraph plant, galvanised ironwork, agricultural implements of all kinds, cement, coals, &c.

Furnished information and assistance to all those desirous of emigrating to Brazil, and contracts for the settlement of emigrants in any part of the Empire. Has several lauded estates in Brazil to dispose of, suitable for capitalists and emigrants.

The Agency also undertakes the collection of bills payable at any part of the Empire—realisation and adjustment of all claims.

Office Hours: Ten till Four.  
J. DE A. PORTUGAL, Manager.

WILTON'S MATHEMATICAL INSTRUMENT ESTABLISHMENT REMOVED from St. Day to A. JEFFERY'S, CAMBORNE.

W. H. WILTON begs to thank his friends for their liberal support for so many years, and informs them that (having opened business at Valparaiso) he has now declined business in England in favour solely of Mr. A. J. JEFFERY, MATHEMATICAL INSTRUMENT MAKER, CAMBORNE, whom he considers (having been an assistant to his father for several years) is in every way capable of creditably maintaining the good name universally awarded to Wilton's instruments.

A. J. JEFFERY

Respectfully begs to inform Mine Managers, Surveyors, Engineers, &c., that having purchased Mr. Wilton's business, and the very valuable acquisitions and appliances belonging thereto, he has enlarged his Mathematical Instrument Manufactory, and is prepared to supply THEODOLITES, DIALS, POCKET DIALS, LEVELS, TRAVERSING AND PLAIN PROTRACTORS, CASES OF DRAWING INSTRUMENTS, MEASURING CHAINS & TAPES, ASSAYERS' SCALES & WEIGHTS, ENGINE COUNTERS, &c., and, in short, every description of Instruments used in SURVEYING, MEASURING, MAPPING, &c.

Repairing in all its branches promptly attended to.

**JOSEPH ORD,  
ENGINEER, MILLWRIGHT, SMITH, &c.,  
101, RILEY STREET, BERMONDSEY, S.E.**  
MANUFACTURER of IMPROVED HORIZONTAL STEAM ENGINES; HYDRAULIC, WHARF, and WAREHOUSE CRANES  
PUMPS of all kinds, made in Brass, Copper, or Iron; also HIDE and SKIN SPLITTING MACHINES, and TANNERS'  
TOOLS of every description to order.  
IMPROVED STEEL TOOTH BARK MILLS, of the most modern description, for Grinding Oak, Valonia, Mimosa, and other Barks.  
CHAIN FOR ALL STOCKS.

Registration of New Companies.

The following joint-stock companies have been registered:—

**RENEWASH VALLEY IRON COMPANY (Limited).**—Capital 20,000*l.*, in 50 shares of 10*l.* each. This company is formed to erect works for iron smelting and manufacturing at Ilkeston, Derby. The whole of the shares are taken up by the seven subscribers to the Memorandum of Association.

**EXCHANGE DRAPERY COMPANY (Limited).**—Capital 45,000*l.*, in 4500 shares of 10*l.* each. This company takes over the business of Messrs. Robert and George Gray, of Fargate, Sheffield, hitherto trading as Grays and Henderson. The subscribers are—A. Davy, George street, Sheffield, 50 shares; Edwin Fox, Sheffield, 196; Edward Jackson, M.B., 23, Blosor-road, Sheffield, 20; G. Fieldsend, 54, Andrew-treet, Sheffield, 25; Thomas Barker, 21, Holly-street, Sheffield, 80; F. E. Smith, 1, George-street, Sheffield, 50; S. Martin, Tydgate Hall, Sheffield, 10.

**MADRID MARKETS COMPANY (Limited).**—Capital 200,000*l.*, in 10,000 shares of 2*l.* each. This company is formed to acquire certain concessions for the construction and establishing of markets at Madrid, &c. The subscribers, who take one share each, are—Frederick Power, 50, Stanhope-gardens; G. Viller, 27, Rock-gardens, Brighton; Col. H. P. Partington, United Service Club; H. B. Mitford, 1, Albert-terrace, Knightsbridge; J. H. Dillon, 125, Albany; H. F. Monroe, 8, Matthias Vicarage, Stock Newington; M. Hopkins, 117, Bishopsgate-street, E.C.

**TRAMWAY CARAN WORKS COMPANY (Limited).**—Capital 60,000*l.*, in 6,000 shares of 10*l.* each. This company is started to manufacture tramway cars and rolling stock. The promoters are—L. F. Floersheim, Bartholomew House, 200 shares; J. M. Walker, 9, Old Broad-street, 200; Philip Rose, 6, Victoria-street, S.W., 150; H. G. Erichson, Odensee House, Quadrant-road, Highbury New Park, 400; W. Sheldon, ditto, 100; W. Morris, 8, Avenue, Blackheath, 100; and Julius Beer, Bartholomew-lane, 200.

**LONDON AND PARIS STEAMBOAT COMPANY (Limited).**—Capital 50,000*l.*, in 10,000 shares of 5*l.* each. This company is formed to establish a line of steamboats between London and Paris. The subscribers are (one share each)—Baron Leon de Crevecoeur, 20, Pavant street; F. P. Jones, 10, Pembroke-gardens-terrace; John Hughes, 93, Great Portland-street; Charles McKintosh, Peckham; Alfred Stubbs, 6, Clarence-terrace, South Lambeth; Alfred Nicholls, 9, Guild-ward-street, Russell-square; Henry Hewett, Forest Gate.

**VACHWER SILVER-LEAD MINING COMPANY (Limited).**—Capital 15,000*l.*, in 8,000 shares of 5*l.* each. This company will work the above-named mine in Montgomeryshire. The subscribers are—Samuel Peake, Linley, near Bishop's Castle, Salop, 5 shares; John Jones, Massington, Chester, 5; J. Faulkes, 49, Premier-street, Everton, 2; W. Manley, 3, Edgmont Padding, Liverpool; J. Peacock, Lovat-street, Liverpool; 1; Edward Davis, 19, Hurley-road, Fazakerley, Lancashire, 1; A. P. Jacob, 7, Vernon-chambers, Dale-street, Liverpool.

**BRISTOL AND WEST OF ENGLAND CO-OPERATIVE LAND BUILDING, AND INVESTMENT COMPANY (Limited).**—Capital 50,000*l.*, in 8,000 shares of 5*l.* each and 10,000 shares of 1*l.* each. This company proposes the acquisition of land for building purposes. The promoters are—T. H. Clark, M.A., Clifton 2 shares; Thomas Wood, 22, Broadmead, Bristol, 7; J. J. Kinnerley, 37, Elton-place, Bristol, 2; J. Harris, 7, Sydenham-terrace, Bristol, 5; Henry Rogers, 74, Frederick Peake, Lovat-street, Liverpool; 1; Alfred Davies, 19, Hurley-road, Fazakerley, Lancashire, 1; A. P. Jacob, 7, Vernon-chambers, Dale-street, Liverpool.

**WATERBLOO AND WOODLESFORD COAL COMPANY (Limited).**—Capital 40,000*l.*, in 4,000 shares of 10*l.* each. This company is formed to purchase the Waterloo Colliery, in the parishes of Whitkirk and Rothwell, in the West Riding of Yorkshire. The promoters are—John William Clay, Warwick-place Leeds, 200; J. T. Clay, Rastwick, 300; J. E. Mannatt, Worthing Grange, Leeds, 100; W. J. Armitage, Farley Lodge, near Leeds, 400; John Marler, Thornfield, near Darlington, 10; John Fetherston, Gash Bardon, Darlington, 10; H. J. Givens, Darlington, 100; W. S. Hall, Woodlesford, near Leeds, 50.

**CORINTHIAN STEAM SHIP COMPANY (Limited).**—Capital 100,000*l.*, in 20,000 shares of 5*l.* each. This company is established for building, purchasing, hiring, and sailing ships and craft of every description. The promoters, who take 10 shares each, are—B. Nicholson, Rock Ferry, Cheshire; W. H. Nicholson, 14, South Castle-street, Liverpool; Josias Millford, Stone-hill House, Oakfield, Liverpool; Dykes Alex. Fox, Molyneux-place, Liverpool; R. S. Wilson, Hackin's Icy, Liverpool; Howard Nicholson, 14, South Castle-street, Liverpool; W. W. Wallis, 83, Friar-street, Derby.

**MOWBRY IRON ORE COMPANY (Limited).**—Capital 20,000*l.*, in 1000 shares of 20*l.* each. Acquiring leases of mineral royalties, raising and selling iron ore, &c., are the objects of this company, which is promoted by the following:—B. Gilson, 200 shares; J. H. Milson, 75; James Robertson, 65; H. Hunter, 21; J. W. Shepherd, 20; W. O. White, 40; John McKeilie, 25, all of Whitehaven.

**GENERAL MORTGAGE AND SECURITIES INSURANCE COMPANY (Limited).**—Capital 250,00*l.*, in 50,00 shares of 5*l.* each. This company is formed to insure to mortgagors the due payment of their principal, or interest, or both, notwithstanding the insufficiency of their securities as to value, thereby giving any loss on the event of the mortgaged property not realising upon sale the amounts charged upon them. The promoters (who take one share each) are—B. Bullock, 22, Queen's-gardens, Paddington; G. F. Collier, 7, Serjeant's-inn, Fleet-street; M. P. Currie, 18, Ledbury-treet, Kensington; H. H. Hatfield, 5, Jeffrey's-square; Chas. E. Hill, 9, Arundel-gardens; W. H. Simpson, 50, Gower-street; Patrick Stewart, 3, Plowden-buildings, Middle Temple, W.C.; Edwin Toppin, Surrey-chambers, 177, Strand.

**PROVINCIAL HAIL INSURANCE COMPANY (Limited).**—Capital 20,000*l.*, in many shares of 1*l.* each. This company will insure property against loss and damage by hail-storms. The promoters are—J. W. Snelling, Winchester, 100; Richard Pink, Hambledon, 100; Henry Dear, Itchen Stoke, 200; T. D. Lewis, Bridgfield House, Southampton, 100; Cornelius Walford, Belgrave Park-gardens, 100; J. V. J. Best, Guildford-road, S.W., 100; H. W. Field, Mint, 10.

**BREMER MINING COMPANY (Limited).**—Capital 50,000*l.*, in 5000 shares of 10*l.* each. This company is established for the acquisition of land for mining purposes in South Australia, or elsewhere. The promoters are—W. W. King, 21, St. Swithin's-lane, 100 shares; Ebenezer Human, 28, Wormwood-street, 100; William Purdy, 54, Old Broad-street, 100; Cyrus Legg, 129, Bermondsey-street, 100; H. M. Simons, 21, St. Swithin's-lane, 100; W. Paterson, 21, St. Swithin's-lane, 100; John W. McLaren, 4, Fenchurch-street, 50.

**CARRIAGE INSURANCE COMPANY (Limited).**—Capital 50,000*l.*, in 50,000 shares of 1*l.* each. This company is formed to insure horses, vehicles, and their drivers against accidents. The promoters are—Cornelius Walford, Belgrave Park-Gardens, 100; W. Smith, Hagley House, Belvedere, Kent, 100; A. White Iner, Bromley, St. Leonards, 100; George Killott, 17, St. George's-square, S.W., 100; Lins La cane, 25, Bittern-street, 5; Juan Luis Pou de Leon, 60, Mark-lane, 5; Nannele de Montis, 41, Mark-lane, 5.

**STEEL MANUFACTURE.**—It is usual in the manufacture of Bessemer and other kinds of steel to allow the ingot after casting to become cold, and afterwards to be re-heated in furnaces before hammering or rolling. The object of the invention of Mr. JOHN BIRCH, of Newton Heath, Lancashire, is to dispense with this re-heating, and to preserve the heat in the ingot and utilise (the heat) for its after manipulation.

He is aware that attempts have been made to work the ingot direct from the converting pit; but these have failed in consequence of the outside of the ingot being too cold, while the inside has been too hot.

He proposes to remedy these defects by enclosing the ingot immediately it is taken from the mould in a suitable chamber or furnace made of fire-resisting and non-conducting substances, such as fire-brick, powdered charcoal, graphite, asbestos, lava, pumicestone, small coke, or any other suitable substance to prevent the heat from radiating from the external part of the ingot, and thus preserving its temperature until the interior is properly set, and the time arrives when its further manipulation or treatment can be more successfully carried out.

**NEW VALVE-CLOSING MECHANISM.**—The invention of Mr. T. CARTWRIGHT, of West Bromwich, consists in shutting off the steam from the cylinder of the engine, whenever by the breaking of the crank pin or other like accident the piston-rod rises higher or descends lower than is compatible with the proper working of the engine. This is effected by causing a safety-rod to be raised or lowered by a ring connected with the top of the piston-rod, striking one or other of the two stop collars secured on the said safety-rod at the required positions.

The motion given to the safety-rod is transmitted by a series of connecting rods, levers, and a crank, to a sliding wedge, which wedge props or supports an arm, and the latter a weighted valve-rod. When this sliding wedge is withdrawn from the arm described, the valve-rod is pressed down by its weight and closes the valve, thereby shutting off the steam and bringing the engine immediately to rest.

**PREVENTING INCrustATION.**—The invention of Mr. A. ZIPPER, of Blaau, Austria, consists in introducing into the water space of steam-boilers an apparatus, consisting of a closed oblong metal vessel, on the underside of which are one or more apertures communicating with vertical nozzle-shaped pipes inside the vessel, while pipes are curved downwards at their upper ends



the cutting of Gorsedd and Merlyn veins in the driving of the deep adit. The former, in shallow workings, yielded 10,000*t.* worth of lead; the latter, in adjoining ground, considerably over this amount. Altogether, the shareholders may be congratulated on possessing such a property.

### Original Correspondence.

#### TRELEIGH WOOD.

SIR.—In your City Article of last week you remark that the shares in Treleigh Wood advanced 10*l.* per share, although there was no change in the mine "according to the agent's report."

At the meeting, held on Wednesday, the agent's report, dated three days after your remarks appeared, stated that he had explored workings from the 19 fm., level up to 12 fm., and for a distance of at least 25 fms., in which he "found thousands of tons of limestone already broken that can be hauled away at a profit." May I ask Capt. Odgers to inform us why this extraordinary discovery was not communicated to the shareholders before? It is perfectly notorious that large numbers of shares were bought up for several days prior to the meeting, and from holders who would not have sold had they been in possession of information which they had a right to know.

Capt. Odgers further states that, judging from samples taken from different places in the excavations, the lode must have been worth, at the present price of tin, 60*l.* to 70*l.* per fathom. At the time this lode was worked it was at 40*l.* per ton, and this would make the lode worth 30*l.* to 35*l.* per fathom for the old miners; and can Capt. Odgers, then, explain how it was that these miners, working in a lode worth 20*l.* per fathom, left thousands of tons of limestone broken in their levels?

#### TERRAS TIN MINING COMPANY.

SIR.—In last Saturday's Journal appeared a letter on Terras, signed by J. Addison, which is calculated to convey a wrong impression to your readers. To the writer's previous effusions we have never deigned a reply, as he evidently is quite ignorant of mining. In our own justification we merely state that Mr. John Addison has purchased 582 shares in Terras, at prices varying from 3*l.*, that he applied to us and other dealers to negotiate a loan upon them, and that the security was not considered desirable. He expressed himself confident that we had formed an erroneous opinion upon the value of the property, to which we replied that, after having personally inspected the mine, and obtained the opinions of some of the best tin authorities, we saw no reason to alter the estimate of its prospects, which we had expressed to him 10 months since. We advised him not to act upon our opinion, which he might deem biased, but to consult any stockbroker acquainted with mining, or to have the mine inspected by an independent agent, before operating. May we ask him whether he has acted upon our suggestions, and with what result? Mr. Addison exists because a meeting has been called to declare a dividend. Perhaps he can inform your readers why Grampound-road was the convenient spot selected, what is the exact financial position of the company, and whether he expects a dividend declared under such circumstances will enhance the market value of the shares?

The following is a copy of a letter which we afterwards received:—

Ormskirk, Jan. 6.—had a letter to-day stating you could not sell the shares you offered at 28*l.* or 30*l.*. How is this? Humbly, or what? Will sell you 20*l.* at 45*l.* (no return of post), 30*l.* at 10*l.*, and 33*l.* also. Now, go in for them, and you will make a fortune by August. In spite of all you say, T— is a tramp.—J. ADDISON.

Should a commission de lunatico inquirendo result, would such a letter be admitted as evidence? For the benefit of investors in mining securities generally, we have endeavoured to show that this company has not been managed according to the requirements of the Limited Liability Act of 1862 and 1867, and that gross abuses, or novelties, as Mr. W. S. Pearce, the secretary, has termed them, have been introduced. That the "new director," the champion of the board, has failed to answer our queries is sufficient proof that they were pertinent and unanswerable. We are now content to leave the issue to time, and we hope that we may survive until the second dividend is declared.

29, Bishopsgate-street Within. W. MARLBOROUGH AND CO.

[For remainder of Original Correspondence see this day's Supplement.]

#### WATSON BROTHERS' MINING CIRCULAR.

MESSRS. WATSON BROTHERS return their most sincere thanks for the great patronage bestowed and confidence reposed in their firm for nearly 30 years, and to assure their friends and clients it will be their earnest endeavour to merit a continuance of both.

In the year 1842, when Cornish mining was almost unknown to the general public, attention was first called to its advantages, when properly conducted, in the "Compendium of British Mining," published in 1843, and published in 1848, by Mr. J. Y. Watson, F.G.S., author of "Gleanings among Mines and Miners," "Records of Ancient Mining," "Cornish Notes" (first series, 1862), "Cornish Notes" (second series, 1863), "The Progress of Mining," with statistics of the Mining Interests annually for 21 years, &c., &c. In the Compendium, published in 1843, Mr. Watson was the first to recommend the system of a "division of small ricks" in several mines, ensuring success in the aggregate, and Messrs. WATSON BROTHERS have always selected list on hand. Perhaps at no former period in the annals of mining had there been more peculiar need of honest and experienced advice in regard to mines and share dealers than there is at present, and, from the lengthened experience of Messrs. WATSON BROTHERS, they are emboldened to offer, thus publicly, their best services to all connected with mines or the market, as they have for so many years done privately, through the medium of their own Circular.

Messrs. WATSON BROTHERS are daily asked their opinion of particular mines, as well as to recommend mines to invest or speculate in, and they give their advice and recommend mines to the best of their judgment and ability, founded on the best practical advice they can obtain from the mining districts, but they will not be held responsible, nor subject to blame, if results do not always equal the expectations they may have held out in a property so fluctuating as mining.

WATSON BROTHERS,  
MINING AGENTS, STOCK AND SHAREDEALERS, &c.,  
1, ST. MICHAEL'S ALLEY, CORNHILL, LONDON.

SATURDAY.—Market very active for Van Consols, East Basset, West Basset, South Frances, Cook's Kitchen, West Chiverton, Pacific, Utah, and Tin-croft shares, at advanced prices. Van Consols, 3*l* to 3*l*; East Basset, 2*l* to 2*l*; West Basset, 1*l* to 1*l*; South Frances, 67*l* to 72*l*; Cook's Kitchen, 4*l* to 5*l*; Tin-croft, 4*l* to 5*l*; Carr Brea, 137*l* to 142*l*; Treleigh Wood, 20*l* to 22*l*; New Rosewarne, 13*l* to 17*l*; East Grenville, 2*l* to 2*l*; East Lovell, 11*l* to 12*l*; East Van, 8*l* to 8*l*; Great North Laxey, 22*l* to 25*l*; Huntington, 3*l* to 4*l*; New Lovell, 13*l* to 2*l*; North Rosewarne, 7*l* to 7*l*; Old Bottle Hill, 7*l* to 8*l*; Parva Mountain, 3*l* to 3*l*; Prince of Wales, 20*l* to 22*l*; Tankerville, 18*l* to 18*l*; Roman Gravels, 18*l* to 18*l*; Bulier, 37*l* to 39*l*; Eberhardt, 8*l* to 9*l*; South Aurora, 2*l* to 2*l*.

MONDAY.—Market moderately active for Treleigh Wood, Van Consols, West Basset, Tincroft, Cook's Kitchen, East Basset, Utah, and Butler. Treleigh Wood, 22*l* to 25*l*; Van Consols, 3*l* to 3*l*; West Basset, 1*l* to 1*l*; Tincroft, 6*l* to 6*l*; Cook's Kitchen, 4*l* to 5*l*; East Basset, 20*l* to 22*l*; Tin-croft, 3*l* to 4*l*; Butler, 20*l* to 40*l*; Gwydir Park, 17*l*, 6*l*, to 22*l*; Great Laxey, 14*l* to 16*l*; Great North Laxey, 22*l* to 25*l*; Marke Valley, 5*l* to 6*l*; New Rosewarne, 13*l* to 16*l*; Tankerville, 18*l* to 18*l*; Parva Mountain, 3*l* to 3*l*; South Roman Gravels, 2*l* to 2*l*; South Frances, 67*l* to 70*l*; Pacific, 3*l* to 3*l*; Eberhardt, 8*l* to 9*l*; Ecclips, 12*l*, 6*l*, to 17*l*, 6*l*.

TUESDAY.—The market has again been active for Van Consols, Treleigh Wood, West Basset, East Basset, Tincroft, Carr Brea, Old Bottle Hill, and Perkins Beach. Van Consols, 3*l* to 3*l*; Treleigh Wood, 20*l* to 22*l*; West Basset, 14*l* to 15*l*; East Basset, 25*l* to 27*l*; Tincroft, 4*l* to 6*l*; Cook's Kitchen, 4*l* to 5*l*; New Rosewarne, 14*l* to 16*l*; North Rosewarne, 20*l* to 23*l*; Old Treburgh, 20*l* to 22*l*; Roman Gravels, 18*l* to 18*l*; Prince of Wales, 20*l* to 22*l*; Grenville, 9*l* to 9*l*; South Frances, 20*l* to 24*l*; Pennerley, 3*l* to 4*l*; East Cadron, 3*l* to 3*l*; Great Vor, 9*l* to 10*l*; Utah, 4*l* to 4*l*; South Aurora, 2*l* to 2*l*.

WEDNESDAY.—Settling day. Market quiet, the dealers busy with the settlement. Treleigh Wood, 27*l* to 32*l*; Van Consols, 3*l* to 3*l*; Tankerville, 18*l* to 19*l*; South Roman Gravels, 22*l* to 24*l*; South Condurrow, 8*l* to 8*l*; Roman Gravels, 18*l* to 19*l*; Bedford United, 3*l* to 4*l*; Bog, 2*l* to 2*l*; Cook's Kitchen, 4*l* to 5*l*; New Rosewarne, 14*l* to 16*l*; North Rosewarne, 20*l* to 23*l*; Old Treburgh, 20*l* to 22*l*; Roman Gravels, 18*l* to 18*l*; Pennerley, 3*l* to 4*l*; East Cadron, 3*l* to 3*l*; Great Vor, 9*l* to 10*l*; Utah, 4*l* to 4*l*; South Aurora, 2*l* to 2*l*.

THURSDAY.—Market steady. Van Consols, Old Bottle Hill, Roman Gravels, Tankerville, and Tincrofts chiefly dealt in. Van Consols, 3*l* to 3*l*; Old Bottle Hill, 7*l* to 8*l*; Roman Gravels, 18*l* to 19*l*; Tankerville, 18*l* to 19*l*; Tincroft, 4*l* to 6*l*; East Basset, 24*l* to 25*l*; West Basset, 14*l* to 15*l*; Great North Laxey, 22*l* to 24*l*; West Frances, 30*l* to 32*l*; Lucy, 4*l* to 5*l*; Pennerley, 3*l* to 3*l*; South Condurrow, 8*l* to 8*l*; Grenville, 9*l* to 9*l*; Old Treburgh, 20*l* to 22*l*; Eclipse, 15*l* to 17*l*, 6*l*; Pacific, 3*l* to 3*l*; Utah, 3*l* to 3*l*.

FRIDAY.—Good demand to-day for Grenville, Van Consols, Bog, Pennerley, Old Bottle Hill, West Basset, and Carr Brea. Grenville, 9*l* to 10*l*; Van Consols, 3*l* to 3*l*; Bog, 2*l* to 2*l*; Pennerley, 3*l* to 4*l*; Old Bottle Hill, 7*l* to 8*l*; West Basset, 14*l* to 15*l*; Carr Brea, 137*l* to 142*l*; East Lovell, 11*l* to 12*l*; Gwydir Park, 17*l*, 6*l*, to 22*l*; New Rosewarne, 14*l* to 16*l*; North Rosewarne, 6*l* to 7*l*; Parva Mountain, 3*l* to 3*l*; Seton, 2*l* to 3*l*; Eberhardt, 8*l* to 8*l*; South Aurora, 2*l* to 3*l*; Pacific, 3*l* to 3*l*.

#### [ADVERTISEMENT.]

From Mr. ALFRED E. COOKE (76, Old Broad-street):—During the past week the dealers have been engaged in the fortnightly settlement, so that there has not been much general business transacted. There is no change of importance to notice. TANKERVILLE shares have been firm, and a large number have taken up this account for investment. WEST TANKERVILLE remain at the same price; I recommend them to be bought at 3*l* to 3*l* for a rise. There have been several buying orders for SOUTH ROMAN GRAVELS shares; as I remarked last week, at the present low price—22*l*, 6*l*, to 25*l*—they should be secured. VAN CONSOLS have risen above 10*l.* per share during the week. Rumours are ripe that the lode in the wing has entirely cut out, and that sinking has been suspended, and driving of the end resumed, where the lode is poor. Would it not be better to grant facilities for independent agents to inspect than to throw obstacles in the way? The meeting of shareholders in the GREAT WESTERN TIN MINE was held last Tuesday. Although it has taken longer than was anticipated to bring this mine to a profitable condition, I believe we shall not have long to wait before this object will be accomplished. At about 25*l.* they offer a very good speculation and shareholders would do well to average at that price. The managers of the mine are large holders, and confident of the ultimate success of the undertaking. Another low-priced share which should be sought is FRANK MILLS. Some will remember that two or three years ago they were at the present price—10*l.*, 6*l*,—but soon advanced to 4*l*. They will soon reach the rich ground which has been gone through in the levels above, and which enabled them to pay dividends. Although the points do not appear rich, it must be remembered that the ground is easy for working,

thus profits can be made here when it would be impossible in other mines. In the railway and foreign stock markets there has been a semi-panic. The public will see that political and other questions do not affect British mines; although risky, there are many in which capital may be safely employed.

#### PENNSYLVANIA AND ITS COAL FIELDS—RAILWAY EXTENSION.

The abounding mineral wealth of Pennsylvania is just now attracting a considerable amount of attention by reason of the gratifying results accruing from such comparatively limited portions of the State as have as yet been opened up. The absence of direct means of communication between the great producing and consuming centres has tended to seriously retard enterprise and development, but as the present circuitous lines of transit are supplemented by more direct routes the returns of coal and other mineral must progressively increase. Already the yearly produce of coal alone exceeds 30,000,000 tons, but in addition to the coal there are extensive deposits of iron, and large tracts of valuable timber, besides saline springs, oil wells, and other natural wealth, which are now reached with great difficulty.

The object of the railways which traverse the north-western region of the State was, in the first instance, to connect the Lake cities with the large towns of the Atlantic seaboard; consequently, they skirt some of the richest portions of the mineral districts, and afford to others a circuitous and expansive outlet for their products. So much is this the case, that to this day in northern New York and in the Canadas, notwithstanding the long winter, the use of coal is almost prohibited, owing to the heavy cost of transport.

The Elk and M'Kean Railway, referred to elsewhere, will form the key to the whole of this important region; and the tract of country thus opened up is, perhaps, the richest for its extent in the Union. It is a well-known fact that lines which tap a wealthy mineral district are by far the most remunerative. This railway will form the only route whereby the cities of north and north-western New York can obtain direct access to the richer bituminous coal measures; and charters are held by the company which give it the fullest right, and preclude all other parties from trenching upon this ground.

The coal is described as practically inexhaustible, much of it being superior in quality to anything found elsewhere. Several valuable collieries are in full operation, one company's property alone estimated, by competent authorities, to contain 30,865,000 tons of good workable coal. This railway will bring Buffalo within 95 miles of the Bunker Hill coal field, within 120 miles of the St. Mary's Coal Mines, within 130 miles of the Centreville Collieries, and within 240 miles of the anthracite coal beds of Shamokin.

#### COAL, IRON, AND RAILWAYS IN AUSTRALIA.

The demand for English railway iron in Australia is not of very great importance at present; still there was more enquiry last year from the Antipodes than in 1870, since we sent 14,100 tons of rails and railway material to the Australasian group in 1871, as compared with 8,691 tons in 1870, and 23,329 tons in 1869. It will be seen, however, by the annexed comparative table that the consumption of our railway iron in the Australias is very small as compared with the corresponding consumption in British America:—

#### EXPORTS OF BRITISH RAILWAY IRON TO AUSTRALIA AND BRITISH AMERICA.

Direction of export. 1869. 1870. 1871.

British America ..... Tons 23,792 ..... 36,211 ..... 61,738

Australia ..... 23,329 ..... 8,691 ..... 14,110

These figures are very suggestive, showing, as they do, that there has been a great increase in the energy displayed in the prosecution of railway works in British America, while corresponding industry in Australia has languished to some extent. The readiness with which communication can be effected with British America, and the great distance which separates, on the other hand, Australia from Europe, are the two great causes which have contributed to this result. Account must also be taken of the fact that after a century—and about 100 years have elapsed since COOK first revealed to English eyes the wonders of Australia and New Zealand—the Australias can still muster a white population of only some 1,800,000, while Her Majesty's subjects in British America are at least twice as numerous. But notwithstanding all this, railway enterprise presents some attractions in the Australias which it lacks in Canada, since although the Australias may be remote from European life, they are also far removed from European conflicts, while they are also not subject to the contingency of becoming the battle field between two great nations—a contingency which may one day befall British America. In fact, the very remoteness of the Australias is their best security.

But we must not judge the Australias by their past, or even by their present. If their progress has thus far been slow—if 80 years of Antipodean colonisation have only accumulated population to the extent of 1,800,000—we must not accept this as a final result. Five settlements, each of more or less importance, have now been founded in Australia proper, while a population of 260,000, or thereabouts, has also been accumulated in New Zealand. In Tasmania the progress effected is certainly slow, but it is progress notwithstanding, and in every part of Australasia the locomotive is now making a gradual advance. If the development of railways is a matter of time and difficulty in the Australasian colonies, it must be remembered that every additional section which is opened will add to their wealth, and open out their resources, thus rendering the construction of future lines a more easy matter. For instance, the Kaipara Railway, in the province of Auckland, New Zealand—the first of which was turned recently—will bring Auckland, the chief town of the province, into communication with 1954 square miles of country, or about 1,250,000 acres. The general aspect of the Kaipara and its tributaries is far more open, and the quantity of good agricultural land is more extensive than at the Hokianga, while from the abundance of its timber the Kaipara district is a locality well adapted for shipbuilding establishments. It is easy, in the presence of such circumstances as these, to see the great benefits which this one railway is destined to confer upon the province of Auckland; and illustrations to the same effect might be multiplied. New Zealand appears especially disposed at present to enter upon a railway campaign; and as both islands are destitute, to a great extent, of ordinary roads, while the north island is what the French would call *un pays tourmenté*, there is no doubt that the great modern means of communication are extremely essential to promote the development and utilisation of the vast resources which are at the command and disposal of the colonists, although they have hitherto, from unavoidable circumstances, been almost entirely neglected. It is not only the development of railways which now occupies the attention of New Zealand, but arrangements have also been concluded by which direct steam navigation has been secured between New Zealand and San Francisco. This latter measure, by facilitating communication between New Zealand, the United States, and Europe, will greatly promote New Zealand interests, and will involve, *inter alia*, the utilisation of New Zealand and Australian coal. This question of the employment of Australian coal on a larger scale than at present is obviously one of very considerable importance, and it is satisfactory to find that a company has been formed for acquiring and working the Miami and New Lambton Collieries, at Newcastle, New South Wales, and also for supplying the chief ports of India and the Eastern seas, the intercolonial ports, and those in the Pacific seas with Australian coal, so as to meet the demand for coalising facilities which the opening of the Suez Canal has rendered necessary. This is obviously an important enterprise.

CAMP FLOYD.—The *Salt Lake Review* of Jan. 2 says:—"In our Saturday edition, in mentioning the ore being shipped by our friend Captain Shaw, we stated that it was taken from the Silver Cloud instead of the Sparrow Hawk Mine. The Captain informs us that the lead is 4*l* ft. in width, and for 9*l*. in height or similar to that being shipped itself. All who have seen the ore represent it as very rich, some even placing the value at \$6000 per ton. Captain Shaw is now endeavouring to get the railroad company to ship the ore east, but, owing to the snow blockade, they will receive no freight. He hopes, however, soon to be able to start it on its way."

MALPASO GOLD-WASHING COMPANY.—There have been enquiries during the week for the shares in this company, consequent upon the very favourable advices received from the company's mines. The company was formed a few months since for the purpose of working, by the hydraulic process, a very large deposit of auriferous gravel in the United States of Colombia, and the shares were subscribed without any application to the public, the vendors showing their confidence by taking the whole of the purchase-money in full paid-up shares. The directors engaged Mr. Clarke, a Californian hydraulic engineer, to go down and take charge of the company's operations, and his property was received by the last West India Mail. He states that the miners are very rich, and that the mines can be worked to great advantage by the hydraulic process, all the local conditions being very favourable. This was confirmed by the spot confirm in the fullest manner the statement of Mr. Clarke. It is expected that washing will be commenced about March, and the result of the work will be a profit for the shareholders, extraordinary results may be looked for by the Spaniards.

were not renewed, and that in 1839, a short time before the expiration of the leases, the mines passed from the hands of Messrs. Clark's company to those of a company formed by Messrs. Williams, & paid £20,000. for the machinery, plant, ores, &c. Whatever have been the merits of this dispute—and we believe the lords their agents to have been entirely in the wrong—there can be question that the refusal to renew the leases was disastrous to the miners, to the district, and, above all, to the lords themselves, and in small degree also to their agents. During the last year of Messrs. Clark's working they used every possible means (which, under the circumstances, they were justified in doing) of digging out, regardless consequences, all the ore in the mine; and in that year (1839) it divided among the shareholders dividends to the amount of £1 per share. The mines never permanently recovered this, for though they made very great profits afterwards, this last year's king sowed the seeds of disaster, which has ultimately ended not in their abandonment, but in the abandonment of their neighbours, the United Mines and Clifford Amalgamated—all of which, it seems, have gone on pleasantly, would have been working now.

## MINING NOTABILIA.

[EXTRACTS FROM OUR MINING CORRESPONDENCE.]

**BONNIVELLS (Lead).**—During the last few days an interesting movement of sound has taken place at this mine. Some 18 or 20 months back the adit was commenced at the base of the Rhylw-Mwyn mountain, near Bryn-y-mawr, to intersect a productive lead lode opened on the summit. It was calculated from the underlie of the lode that it would be reached in 150 fms. driving. Over 145 fms. has been driven, and during the last days the men at work on the lode in the top level can distinctly hear the noise of the men at work on the lode in the bottom level. This, of course, at once shows that they are approaching the lode. It is also believed that this remarkable conveyance of sound indicates a continuous and solid metallic formation of the lode, metallic substances being good conductors of sound; and every man will admit that where sound is conveyed in a mine that it is one of the favourable kind for the discovery of a good course of ore.

**NORTH POOL.**—The favourable features recently reported not only remain, but increase. The mine altogether looks well.

**FOREDD AND CELYN LEVEL.**—Great improvements have lately been made in this mine, and little doubt can exist that this year will produce a record, which, when commenced, may be expected to be continued, as the work is very extensive, and possesses lodes of great wealth.

**WHEAL WHISPER (late Treveedoe).**—has been reconstituted under Limited Liability Acts of 1862 and 1867. The shares have been in good demand, owing to a valuable discovery of rich copper ore. The monthly sale of £1,000 a month.

**WEST WHEAL LUCY.**—This sett, immediately to the west of Wheal Lucy, and containing the same valuable lodes, has been secured, and operations forthwith commenced on a good lode of tin. The run from this sett to the western boundary of Wheal Lucy is believed to be a mass of tin in depth.

## FOREIGN MINES.

**WESTLAND CREEK (Gold).**—G. D. McLean, Jan. 7: The seam of new tunnel is now in 625 ft.; seam swinging more to the west to-day, and driving immediately to the desired point, and much softer. Red Hill prospecting well under the streams from our little giant, and everything looking propitious. We received your letters of Dec. 8 acknowledging receipt of drifts and news of the Red Hill for 10 cents per inch, and am making some profit. Since it does not now look half so formidable as at first. I am now getting on the Red Hill for 10 cents per inch, and am making some profit. Since we have had our new machinery at work (the draulic little giants, &c.) our progress is much better, and the tunnel seems less of a burthen. I intend to sink and drive 200 ft. from three faces on the new tunnel as soon as practicable. Our last run, however, there was only a partial clean up in the creek, and that near two weeks ago. We were compelled to erect the new pipes, was a very good one. The bed on the left or east of the channel is keeping pretty well up, and, should it continue so long we may possibly have grade until our tunnel is in.

**PACIFIC.**—H. Pridgeaux, Jan. 8: We have during the past week driven from the mine 28 tons of ore, and shipped to the mill 19 tons 4 cwt., 36 lbs., estimated value of the ore shipped to the mill is 10 tons 17 cwt., 66 lbs., at £10 per ton; and 8 tons 6 cwt., 70 lbs., at £70 per ton. The rise from the 530 ft. is now held to the 400 ft. level; here we have a piece of ground in rear of the 100 ft. to 120 ft. By holding this rise we have conveyed air to a bunch, or, or areas which we could not work for want of air. We are about to commence sinking on this ore, which shows a ledge 2 feet wide. We again come to the 330 ft. level; here we have a contract for 100 feet, at £70 per ton. We have also commenced to drive the north cross cut at the 100 ft. level; here we have another contract of 100 feet, at £70 per ton. Driving this cross-cut we shall soon intersect some new ledges. All the old and camp-wine are improving. The ore from these stopes are richer now. The stopes west of camp-wine are without any particular alteration. Tributaries' stopes on Batters' ledge are producing rich ore. All other parts of the mine are without change to remark.

**LMADA AND TIRITO.**—Mr. Clemens, Dec. 8: The mine continues about the same as when last reported. We are doing all we can to open up the tunnel, but until we get the wine through we are at a standstill. The lode in the wine is rich, and moderately productive in the lower levels driving north and south. In Providence we have obtained hands to assist in the driving of the cross-cut from the bottom of the shaft, and from the main indications I believe we are within 3 or 4 ft. of the lode.

**CAMP FLOYD.**—E. B. Wilder, Dec. 31: To date hereof, I here present a statement of the property owned by this company, embodying also work done and ore extracted. The mining ground, as applied for by patent, embraces the following. The Last Chance, 200 feet by 800 feet, containing an area of acres. Sparrow Hawk, 200 ft. by 600 ft., 2.75 acres, and the Marrion, 200 ft. by 600 feet, 7.34 acres; total, 18.76 acres. A mill site, 500 feet by 200 feet, containing 20.24 acres. On my arrival at the mine (Dec. 3) I found an open cut on Sparrow Hawk's location, from which some very fine ore had been taken, and the north end of this cut a drift had been run northerly 49 feet through mattock and ore. At the end of this drift a wine had been sunk some feet, and from these openings about 110 tons of ore was extracted. On the Chance two open cuts had been made, from which a few tons of good ore were extracted, and on the Marrion several open cuts had been made, in which one had been run with. As the mill about to be erected would require a considerable amount of water for the boilers, and the manipulation of the ore, attention was called to the same, and a survey made by which a sufficient amount of water could be obtained from the large spring by conducting the same through a pipe line down, which was highly essential to the future interest of the company, the estimate of which is made out and forwarded. By reference to the survey, the average of the work would be about 11 days for each man; with this we have extracted about 300 tons of good ore, being first and second class, which we expect to sell to Salt Lake City for transhipment to the company in a present I am unable to determine the actual value of this rich ore, and the value of the ore extracted, but from close observation of the same, and a familiarity with ores of a similar character, they work at salt not less than £80 per ton silver, and probably go much higher, particularly the No. 1, or first-class of the 410 tons of the extra rich ore will be the highest; of this latter we have on hand to date 50 sacks. The wine Sparrow Hawk, I have done but little in, preferring for the present to work in the best advantage in order to have a large stock of ore ready by the time the mill is ready. On the Last Chance two cross-cuts to the vein and the crossing have been started; cross-cut No. 1 is in 79 feet in width, matter of fact, we have been driven in 15 feet, but not far enough to strike the ore, which we are still getting good ore, which increases as the work progresses. In open cut on Last Chance we are at the completion, and awaiting the arrival of the piping from San Francisco, exact measurement of which will be given when the pipes are laid. The storms of snow, &c., which we have had has to some extent retarded our work; it has been impossible to guard against. By the end of January I shall be in possession of data from the developments being made that enable me to give a thorough description of the property, accompanying same by a map of the property, showing the workings on each location, and extent, with every particular that may be of interest. In conclusion, I have the liberty of saying that having been over 25 years engaged in mining the general superintendence of a great many mines during that period, it is my pleasure in asserting that the property of the Camp Floyd Silver Mining Company (Limited) is a very valuable one.

**ALL ANTOGRAPHIA.**—Capt. Roberts, Jan. 23: An improvement has been made in the bottom of incline shaft, under the 30 fm. level, the lode passing at present 14 ton of ore per fathom.

**EGO-ARGENTINE.**—The report for November states that operations generally have been prosecuted vigorously. Weather still continues fine, and adequate stamping mill completed, with the exception of laying the strakes; and the driving of a amalgamating machinery which up to last trop has been connected to engine. Foundation for engine house of pumping and winding-engine has been excavated, and a quantity of stone is already on the site. Building will be commenced immediately the houses, &c., required for reduction works are completed. The health of the establishment is favourable.

(For remainder of Foreign Mines see to-day's Supplement.)

**MINING ON THE PACIFIC SLOPE.**—The latest advices are to the effect that the dearth of news is attributable to the stoppage of extraction and no assays in proportion to the benefits that will accrue. The rivers are still high, and plenty of water in them to run the mills. The Eureka division with the mines Phenix and Eureka Consolidated, will be forwarding a amount of bullion. Taking all in all, no year has opened with better news for a successful one than 1872. The total bullion shipped by Wells, & Co., to the Virginia office for 1871 was 6612 bars, weighing 2,000,000 (2,000 tons), and worth £10,921,412. The shipments from the Gold Mine, Wells, Fargo, and Co. are not included in the above; including the amount from Gold Hill the total is over \$12,500,000. The shipment from the books of Wells, Fargo, and Co., in this city, and can be relied

**MERCHANTS, MANUFACTURERS, AND TRADERS,**  
REQUIRING ACCOMMODATION,  
Should apply in the first instance, in confidence, to—  
“Z.” 8, ZENNOR ROAD,  
CLAPHAM PARK,  
SURREY.

**E L FORD, WILLIAMS, AND CO.,**  
COPPER ORE WHARFINGERS,  
SHIP BROKERS AND COAL EXPORTERS  
METAL AND GENERAL COMMISSION AGENTS,  
SWANSEA.

**ELFORD, WILLIAMS, and Co.** having erected an assay office, and engaged the services of a practical Cornish assayer, who will devote his whole time to this branch of their business, they are now in a position to make correct assays of silver, copper, and other mineral ores, on the most moderate terms.

**MR. CAVENDISH TAOURDIN, SHREWSBURY,**  
STOCK AND SHAREDEALER,  
From his long experience with residence in the district, is always in a position to give reliable information upon the Shropshire Mines, and will sell or purchase every description of shares for net cash or account at the best market prices. Special business in—

**Bog.** Perkins Beach. **Tankerville.**  
**Peunreley.** Roman Gravels. **West Tankerville.**  
**South Roman Gravels.**

Parties wishing to sell or purchase in the foregoing are requested to make early application.

**FOR SALE**—Perkins Beach, at 29s. 6d.

The purchase of shares in the CARDIGANSHIRE OLD BOG MINE (Limited) is strongly recommended. Immediate application should be made.

**WANTED TO PURCHASE,** the following (or any less number), for cash—

500 Pennsrey. 20 Tankerville. 100 West Tankerville.  
50 Roman Gravels.

**Bankers:** National Provincial Bank of England.

**GOLDENHILL, COBALT, NICKEL, COLOUR, BORAX**  
AND CHEMICAL WORKS,  
NEAR STOKE-UPON-TRENT, STAFFORDSHIRE.  
JOHN HENSHAW WILLIAMSON, MANUFACTURER AND REFINER,  
Purchaser of Borate of Lime and Tincale.

THE WORKS ON SALE.

**NICKEL AND COBALT REFINING, AND GERMAN SILVER**  
WORKS, 16, OOZELL STREET NORTH, BIRMINGHAM.

STEPHEN BARKER begs to inform the Trade that he has the following articles for sale:—REFINED METALLIC NICKEL.

REFINED METALLIC BISMUTH.

OXIDE OF COBALT.

GERMAN SILVER—IN GROWNS, SHEET, WIRE, &c.

NICKEL AND COBALT ORES PURCHASED.

**WHEAL RUBY TIN MINING COMPANY**  
(LIMITED).

First issue of capital £7000, in shares of £1 each; 10s. on application, and 10s. on allotment (of which 480 are already subscribed, and the remainder are offered to the public).

**DIRECTORS.**

Captain G. F. CARLYON-SIMMONS, Kensington-gardens-square, London, and Trevally, Cornwall.

THOMAS MILNES, Esq., 4, Euston-square, London.

D. SHEARS, Esq., 60, Devonshire-street, Portland-place.

WILLIAM STEVENS, Esq., Pall-mall Club, St. James's.

**BANKERS.**

Messrs. TWEEDY, WILLIAMS, and Co., Redruth; and their London Agents, Messrs. GLYN and CO.

SOLICITORS.

JAMES ARTHUR MORGAN, F.G.S., 47, Finsbury-circus, E.C.

SECRETARY AND OFFICES.

WILLIAM HENRY FORBES, 47, FINSBURY CIRCUS, E.C.

ARRIVED PROSPECTUS.

This company is formed to purchase a valuable tin mining property in Cornwall, with six tin lodes, situated at Ludgvan, on the junction of granite and Killas, and nearly a mile on the course of the lodes.

The property can be developed by an adit and level shaft made by the ancient timber, without pumping machinery, and at a very moderate outlay.

The directors have obtained two reports to verify the vendor's statement.

The vendors take the entire purchase money, £4000, in shares. Prospectuses, forms of application, reports, and plans and section can be obtained at the company's offices, 47, Finsbury-circus, E.C.

**WHEAL RUBY TIN MINING COMPANY (LIMITED).**

Notice is hereby given, that the SHARE LIST of the above Mine will be CLOSED THIS DAY, SATURDAY, the 3rd of February, 1872.

By order of the Board.

W. H. FORBES, Secretary.

47, Finsbury-circus, London, E.C., February 3.

**THE KESWICK UNITED SILVER-LEAD MINES**  
COMPANY (LIMITED).

Incorporated under the Companies Acts, 1862 and 1867, by which the liability of every shareholder is limited to the amount of his shares.

Capital £30,000, in 6000 Shares of £5 each.

£1 per share to be paid on application, £2 on allotment, and the remainder as the progress of the works may render necessary.

No call to exceed £1 per share, nor at an interval of less than three months.

It is not anticipated, however, that any call will be required.

**BOARD OF DIRECTORS.**

JOSEPH ALLEN, Esq., St. Mark's-square, Hackney, and Corn Exchange, Mark-lane, London, E.C.

JOHN BELL, Esq., M.A., Cambridge House, The Grove, Blackheath, Kent.

WILLIAM BURNETT, Esq., Haverstock Hill, N.W., and Gresham-street, London, E.C.

HENRY DAWES, Esq., 44, Sloane-street, London, S.W., Railway and Rock-Boring Contractor.

HENRY MOLYNEUX, Esq., 7, Leighton-road, Kentish Town, London, N.W.

**BANKERS.**

THE METROPOLITAN BANK (Limited), 75, Cornhill, London, E.C.

SOLICITORS—Messrs. KEMBER and LEE, 1 and 2, Great Winchester-street-buildings, London, E.C.

SECRETARY—JAMES FARIS, Esq.

OFFICES.

1 AND 2, GREAT WINCHESTER STREET BUILDINGS, LONDON, E.C.

PROSPECTUS.

This company is formed for the purpose of purchasing and working an extensive and very valuable property situated in the Parish of Crosthwaite, in the County of Cumberland; for which purpose subscriptions are invited for 3000 shares.

The grant embraces a series of four silver-lead mines, which have been only partially wrought under the disadvantages of inadequate capital and appliances, notwithstanding which their yield was very important and remunerative, so long as the restricted means applied rendered it possible to prosecute the works.

The power employed was a water-wheel of small size and bad construction; latterly, two of the mines were worked by a single adventurer, whose means were too limited to complete the proposed operations. His endeavours, however, were effective so far as they went, and the progress he made will now prove highly beneficial to the company.

Men of the greatest experience in practical mining have given their judgment in favour of the undertaking, and when such authorities as Mr. George Wood, M.E.; Captain Francis, of Caldebeck; and Captain Musgrave declare that the position and prospects of the mines are such as they describe, there can be no doubt as to the valuable results that may confidently be anticipated from opening them up.

Since the time the mines were last wrought to any extent great improvements have been made in the locality, amongst which may be cited the railway, now running through the property, rendering the charges for transit of ore and materials a mere fraction of what they most formerly have cost.

The lord's dues have been reduced from a tenth, as in some sets in the county, to a fourteenth.

The mines are known as the Beckstone, the Thorthwaite, the Ladstock, and the Redwood Mines. They are all situated within a short distance of each other, and can be superintended by one captain.

In the immediate neighbourhood of the property there are other mines wrought on the same lodes that traverse this set, the profits from which have been so great as to appear fabulous.

Some of these lodes are known to be those of the Goldscope (which has been profitably worked for generation) Yewthwaite, and Barrow Mines—all of which have been largely productive. Another is known as the Bradlow Mine lode.

In that mine, this lode proved so rich and pure that quantities of Potter's ore, were sold from it at so high a rate as £2 per ton. *Pima facie* evidence of the estimation in which those mines were held by the ancients is afforded by the extensive—although rude and unsystematic—excavations made by the old men of whom no record exists.

They confidently expect that within one year from the commencement of operations the shares of the company will command a very high premium, and that dividends of a high percentage will be declared.

Should no allotment be made, the deposit will be returned at once, without any deduction.

Prospectuses, with the engineers' reports, form of application, plans, and other information may be obtained at the offices of the company, 1 and 2, Great Winchester-street-buildings, London, E.C., where also specimens of the ore can be seen, and the Articles of Association lie for inspection.

**MR. W. WHITE, PROFESSOR OF CHEMISTRY AND ASSAY.**

OFFICE, 25, FINSBURY-PLACE, E.C.

Assaying taught practically. Lectures to Schools and Public Institutions.

Advice on Mineral Properties.

**THE TIN MINES OF CORNWALL AND DEVON-**

THEIR PRESENT POSITION AND PROSPECTS.

By THOMAS SPARCGO.





worth for tin 12d. per fathom. The lode in the 106 east is unproductive. In the winter sinking below the 106 fm. level, east of shaft, no lode has been taken up since our last report. In the 94 fathom level, driving west of shaft, the lode is worth for tin 20d. per fathom. In the 82 fm. level cross-cut south we have met with what we believe to be the cap of the lode, but shall give more particulars in our next. The lode in the rise in the back of the 34 fm. level, east of shaft, is worth for tin 10d. per fathom. We have no change to remark in the 90 fm. level, east of engine shaft.

**WHEAL LUCY.**—J. Nanarrow, Wm. Harris, Jan. 20: The pitwork is now fixed in the engine-shaft, most of the stands for the flat-rods are erected, and we are laying down pumps to take water to the reservoir. The boiler-house roof is not completed, owing to the rough weather, but we expect it will be done in two or three days. We are making good progress in laying the reservoir, and it will soon be ready to turn in the water. We have begun cutting down the eastern shaft, preparatory to sinking with flat-rods. We expect to be ready to work by the end of this week if we get the castings, &c., from the foundry.

**WHEAL SPARROW.**—W. Tregay, Jan. 20: There is nothing of consequence yet in the 55 west. A part of the number of the men employed are driving there, and the others are still taking up water at the adit level. No other changes to report.

**WHEAL VENGEANT.**—Thos. Odgers, Jan. 21: We have cleared out the shaft-level adit, and have cut 13 fms., and 4 ins., 2 ft. on the course of the lode; the lode here is from 2 to 4 ft. wide, with good tin work for the stamps; the western end is full of stuff, and the ground is taken away. The new shaft lode is 8 ft. wide, worth 30d. per fathom. The ground in the deep adit driving north to cut No. 3 lode is hard for driving, but from the appearance of the end to-day think we shall have a change for the better. We have seven masons building the engine-house, but the weather is much against us.

**WHEAL UNY.**—William Rich, Matthew Rogers, Samuel Coade, Jan. 27: We have disengaged the pitwork below the 110, and are driving the engine at the utmost speed; nevertheless, the water rises at the rate of 1 ft. a day. We have 12 men sinking Hind's engine-shaft. The 100 end, east of Gooding's, is in speedy ground, worth 30d. per fathom. The 100 east is worth 20d. per fathom; 80 fm. 15d.; 60 east, 15d.; 45 east, 8d. per fathom.

**WILLOUGHBY.**—H. Nottingham, Jan. 20: We are now in course of driving out both north and south from the bottom of Pynne's shaft; the lode in the south end is yielding some nice stones of lead and blende; and in the bottom and root of the level the end is unproductive, but the ground is of the same kind character throughout. It is a beautiful-looking lode, about 3 feet wide, bearing north-east and south-west, and underlying 2 ft. 5 in. in a fathom. The north end is of the same character; but, in addition to the same width of lode as in the south end, there is 2 ft. of ridge ground on the hanging side, making the total width more than 4 feet. There is a branch of blende on the footwall, and occasionally we get some nice stones of lead with it. I consider we have a good prospect in driving both these levels, seeing that going north we should soon intersect the other lode; and on the south, from the features at the surface, and the character of the lode in the bottom, we have the strongest reasons to expect a body of ore when we get in a parallel line with the other bunch already discovered, if not sooner. The water is gradually going down in the mine, thus showing that there is a communication between this and the other bunch of ore, which strengthens me in the opinion that there is a strong body of ore to the south of us. The surface labourers are now raising stones, and building up the inside wall of the Bod Lake reservoir. The carpenters are going on with the launders we are making for the double purpose of carrying the water from the reservoirs above the mine to the big wheel, and the tramway from the upper floors, where we purpose grading the stuff down to the crusher. The masons should have finished the cottage at Llanrochwyn, but the wet has hindered them. I shall put them on now to build the loading for hobs by the big wheel, and one or two pillars for supporting the flat-rods in the most exposed parts.

**PLYNLIMMON.**—The monthly sale, of 40 tons of lead ore, realised this week 12d. 11s. 6d. per ton, being 20s. 6d. per ton above the last.

**WHEAL PEVOR.**—The first meeting of the shareholders in this company will shortly be held. The shares, 3000, are subscribed for by influential local and London gentlemen. The prospects are of a highly encouraging character. Rocks of nearly solid tin are being broken by the tributaries from the back of the adit level. The bottom of the mine is only 50 fathoms deep, and it is thought that for about 6000 ft. the property will be brought into a dividend state. No prospectus has been issued, the shares having been privately taken up. No premium will be charged.

**ASHSETON.**—Mawr shaft will in a fortnight be to the 30 fm. level. The vein will be cut through, as it is known to be 12 ft. wide, 18 in. only have been carried in sinking the shaft, and which has been worth 20d. per fathom; the whole lode, therefore, is expected to be of great value. Seeing the valuable discovery in Tannychwch Mine to the west, and close to Asheton boundary, giving 300 fathoms of virgin ground between Mawr shaft and the boundary, it is only reasonable to expect a run of ore all the length of this piece of ground, and which will make Asheton one of the best mines in the county, and shares go higher than ever they have been.

**TANNYBWLCH.**—This mine adjoins Asheton to the west. A shaft has been sunk from surface to a depth of 50 fathoms, a cross-cut driven from the bottom of the shaft, and a splendid vein intersected, worth for so far as cut into 2½ tons of silver-lead ore. The south wall of the lode is not yet reached. The entire value of the vein will be ascertained in a few days. This shaft is only 70 fathoms from Asheton boundary, and being 20 fathoms deeper than Asheton goes to show that the lead already discovered in those mines is only the outcrop, and that by further sinking mine second to none in Wales will be laid open in this part of Carnarvonshire.

**FOLBRENN (St. Agnes).**—This sett made its eighth sale of tin on Tuesday, making altogether 45000 worth sold since March 20 last year. The 12 fm. level, always very unproductive, looks more valuable than ever; and the hoisting into the 32 will be accomplished by the end of this month, opening, as it were, a new mine for development.

**FLINTSHIRE—SAINT LAWRENCE AMALGAMATED MINES.**—The directors of this company are about to appoint Capt. W. Wasley, of Great Fron Fownog, manager of the mines, and consider that a better selection could scarcely have been made, his past success auguring well for the future; the first sampling of lead, about 20 tons, will shortly be sent to market, and arrangements are being made with a Liverpool firm to supply the requisite machinery for clearing Victoria shaft of water, and when this is accomplished a return of 30 or 40 tons per month is looked for; this is said to be a very moderate computation, judging from the ascertained capabilities of the mines, but coupled with the iron and most extraordinary deposits of lead just met with in the Billings Mine, immediately to the east, and on the selfsame lodes.

**VAN CONSOLS.**—The manager reports his firm conviction that the ore lately found (see reports in this day's *Mining Journal*) in the 25 fm. level holds good to the adit 25 fms. deeper. He is pushing on the end to open up the lead ground as quickly as possible. There is no doubt that a large body of ore is standing, as the lode in the adit 40 fms. ahead is very throughout.

**ST. AGNES CONSOLS.**—The engine has gone to work in first-class order, and amidst considerable sensation. This mine will take its stand in the Dividend List, it is expected, much earlier than has been supposed. [A more detailed account appears in the Supplement to this week's *Journal*.]

**THE CHANS MINING COMPANY.**—The lodes already opened upon are said to prove richer than was anticipated, so that every success may fairly be looked forward to in this undertaking at a early period.

**ECLIPSE.**—By the report, which appears in another column, it will be seen that the tramroad has been nearly completed, by which 30 heads of stamps will be kept constantly at work; 20 more heads are being erected. There is ample water-power for all purposes. Independently of gold, large returns of silver may be expected.

**EMMA.**—The third monthly interim dividend, at the rate of 18 per cent. per annum, has been declared. An approximate statement of the receipts shows that the cash balance in hand after paying the first and second monthly dividend amounts to 44,500. The ore in England per last statement, 700 tons, estimated at 25s., 19,750. (less cash received on account thereof, 15,500) = 4250. Ores sold at Utah, 1000 tons, 28,000, less received on account, included in cash balance above, 13,000, = 15,000. Total, 70,000, less estimated expenses to Feb. 1, 1872, 5000; leaving 65,000, which is equal to over four months' dividend. In these figures no account is taken of ores in transit from Salt Lake to New York (over 1000 tons), nor of the ore on hand in Utah, shipment of which has been delayed by reason of the unprecedented snow storms. The road is now, however, open, and the ore is coming forward.

**CUIABA GOLD MINING COMPANY.**—We understand that a proposal for reorganisation and vigorous working of this property has been made, and that there is every probability of the company now becoming a most successful undertaking.

**HYDRAULIC GOLD MINING COMPANIES.**—Attention is being attracted to the success which is attending the operations of the two companies formed here for operating in California in this class of mines. The Sweetland Creek Company has paid regular quarterly dividends of 5 per cent. since the time it started, and from the superintendent's report, which appears in another column, it would seem that the fears which have been entertained of the "grade" of the old tunnel giving out, before the new tunnel is completed, are likely to prove unfounded, and that consequently no suspension of dividends is likely to occur. The next dividend is due at the end of this month, and we understand that the funds are already in hand to pay it. The Birdseye Creek Company, after making large and permanent improvements on their ditch and claims, have re-commenced work, and the superintendent reports a profit on the first run of 15000, and a remittance on dividend account of 10000. The first quarterly dividend will be paid at the end of March: as and as the auriferous deposits owned by this company are practically inexhaustible, a long career of prosperity would seem to be in store. Amongst all the "wild cat" and ephemeral schemes introduced here from the Pacific Coast, it is a satisfaction to know that there are some bona fide properties.

**DICKER'S AUSTRALIAN AND LONDON MINING AND GENERAL AGENCY.**

4, ROYAL EXCHANGE AVENUE, E.C.

Established in 1858.

The fullest and reliable information relative to Australian Gold Mine Investments can always be obtained from the undersigned.

THOMAS DICKER,

(Last Editor of the "Mining Record," Melbourne.)

## The Mining Market; Prices of Metals, Ores, &c.

METAL MARKET—LONDON, FEB. 2, 1872.

COPPER.	s. s. d.	s. s. d.	IRON.	Per ton.
Best selected .....	93	0	78	0
Tough cake and tile	90	0	94	0
Sheathing & sheets..	95	0	93	0
Boats .....	99	0	101	0
Bottoms .....	93	0	101	0
Old .....	85	0	—	—
Burra Burra .....	95	0	—	—
Wire .....	8	1	9	—
Tubes .....	—	0	17	—

BRASS.	Per lb.
Sheets .....	9½d.
Wire .....	10½
Tubes .....	10½d.—11d.
Yellow Metal Sheathing ..	8½d.
Sheets .....	8d.—8½d.

SPLINTER.	Per ton.
Foreign on the spot	22½ 15 0—22 5 0
" to arrive ..	—

ZINC.	Per ton.
In sheets .....	27 0 0 28 0 0

QUICKSILVER (p. hot.)	Per ton.
10	0 0

TIN.	Per box.
I C Charcoal, 1st qua. t 1 18	8 1 16
IX Ditto, 1st quality	9 2 0
IX Ditto, 2d quality	11 0 1 12
IX Ditto, 2d quality	11 0 1 18
IX Coke .....	1 10
IX Ditto .....	1 10 0 1 17
IX Ditto, at works .....	15 10 0 1 14
IX Ditto, at works .....	15 10 0 1 13

STEEL.	Per ton.
Swed., in kgs.(rolled). .	15 0 0
" (hammered) .....	15 19 0 0
Ditto, in faggots .....	17 0 0
English, spring .....	17 10 0 23 0

LEAD.	Per ton.
English Pig, com.....	19 0 0 19 5 0
Ditto, LB.....	19 5 0
Ditto, WB .....	20 10 0 21 0 0
Ditto, sheet .....	5 0 20 10
Ditto, red lead .....	20 10 0 21 0 0
Ditto, white .....	28 0 0 30 0 0
Canadaplates, p. ton ..	20 10 0 21 0 0
Ditto, at works .....	18 10 0 18 15 0

\* At the works, 1s. to 1s. 6d. per box less. † Add 6d. for each X.

Tin-plates 2s. per box below tin-plates of similar brand.

**REMARKS.**—Owing in some measure to the anticipation of possible difficulties arising out of American affairs, prices have fluctuated during the week, and business has not been quite of so active a character as it had previously been. Home demand continues good. Foreign enquiries are coming forward, but in view of the high prices which sellers are enabled to demand for some metals, such markets, as those situated on the shores of the Baltic, which cannot yet take delivery of their contracts are rather disposed to hold off, in the expectation of lower prices possibly ruling before it will be necessary to arrange freights. If the statistical position of the various metals dealt in may be viewed as any guide in the matter, there is not much probability of any depreciation in values at present; and taking into consideration that the demand for most metals quite equals, and in some cases is considerably in excess of, present supplies, and that operatives are demanding higher wages and more favourable terms of employment, it would seem probable that existing prices would be maintained. The realisation from time to time of speculative parcels has to some extent had the effect of temporarily checking the progress towards further advance which the position of the markets indicated a week or two ago. Although no alteration in the Bank rate was announced last Thursday, money is certainly tighter than it has been; but, having taken all these influences into consideration, the argument preponderates in favour of the maintenance of a large business at full rates as the season advances.

**COPPER.**—In reviewing the course of this market throughout the month which has just closed upon us, the chief characteristic has been the remarkable firmness which, notwithstanding certain features tending to shake confidence, has sustained the position of copper. The total charters from Chili for the month of December are 2400 tons, being at the rate of 28,800 tons per annum, or 17,950 tons less than last year. The following is a list of the Chili charters for the last five years:—1871, 50,050 tons; 1868, 53,400; 1869, 62,800; 1870, 53,550; 1871, 46,750 tons. It has been an acknowledged axiom in the trade that the Chilean charters have for years past in a very great degree ruled the course of our market, and the very marked reduction which has taken place since the year 1869, when the charters were as above (62,800 tons), as against 46,750 tons during last year, showing a difference of 16,050 tons, cannot fail to exercise a most salutary effect upon prices; and, should the present ratio of supply continue throughout the current year, we shall have a further falling off in supply at the end of it to the extent of 18,000 tons. But, instead of reduced supplies, what is needed is a much larger supply to meet the ever increasing demand; and the charters next month should be at least 5 00 or 600 tons, or greater scarcity must be expected, and in that case prices would again experience a rapid advance. In the building of locomotive and other engines employed for manufacturing purposes, and in marine engines, large quantities of copper are employed, and the demand for this work is greatly on the increase. Telegraphy and the manufacture of cartridges are also now becoming important branches of trade, in which very large quantities of copper are consumed. But one of the largest and most important outlets for copper is the Indian market, and hitherto there has been but little disposition to respond to the rise which has taken place in England. The exports have fallen off so considerably that a quantity of 10,000 tons would not more than suffice to make up the deficiency which the small exports of the last year must have induced. The market closes quiet, but with little variation in price. Chili bars, 81 10s. to 87, according to brand, and prompt. Second-hand parcels of tough, 90t.; furnace stuff, 17s., to 17s. 6d. per unit.

**IRON.**—From the North of England the reports continue to confirm the satisfactory accounts which we have furnished of late, and the markets all close with extraordinary firmness, and an upward tendency in prices. The price of pigs, No. 1, 75s. to 75s.



ISSUE OF 10,000 SHARES OF £20 EACH, BEING THE CAPITAL OF  
THE SOUTH CLEVELAND IRONWORKS COMPANY

(L I M I T E D).

Incorporated under the Companies Acts, 1862 and 1867.  
By which the liability of each shareholder is limited to the amount of his shares.

Capital £200,000, in 10,000 shares of £20 each.

Payable as follows:—

£2 per share on Application.
5 " Allotment.
5 " 1st March, 1872.
5 " 1st April, 1872.
2 " 1st May, 1872.

Estimated revenue on completion of the works, £54,500 per annum, equal to 27 per cent. on the capital of the company.

DIRECTORS.

R. BRYDGES WILLYMAN, Esq., M.P.—CHAIRMAN.

C. J. APPLEYBEE, Esq., C.E. (Messrs. Appleybee Brothers, Hydraulic Engineers and Iron Founders, London, and London Steam Crane Works, Leicester).

The Hon. HENRY BROUGHAM, London.

Major-General CHARLES JAMES GREEN, R.E. (Director of the Carnatic Railway), London.

JAMES LIVESLEY, Esq., C.E. (Consulting Engineer to the Buenos Ayres Great Southern Railway), London.

JOHN YEOMAN, Esq., Whitby, Yorkshire (Resident Director).

ENGINEER.

J. G. BECKTON, Esq., C.E., Whitby, Yorkshire.

SOLICITORS.

Messrs. KIMBER and ELLIS, 79, Lombard-street, E.C., London.

BANKERS.

Messrs. FULLER, BANBURY, NIX, and MATHIESON, 77, Lombard-street, E.C., London.

BROKERS.

Messrs. HUGGINS and ROWSELL, 1, Threadneedle-street, E.C., London.

AUDITORS.

Messrs. JOHNSTONE, COOPER, WINTLE, and EVANS, 3, Coleman-street buildings, E.C., London.

SECRETARY—HAROLD KEMBER, Esq.

OFFICES—12, GREAT WINCHESTER-STREET, E.C., LONDON.

PROSPECTUS.

This company is formed for the purpose of acquiring, working, and developing the valuable mining property known as the Esk Valley Ironworks, in the famous Cleveland iron district, which have been disposed of by the executors in consequence of the death of the late proprietor, Mr. William Watkin.

The property is situated at Grosmont, within seven miles from the port of Whitby, whence there are excellent shipping facilities for London, Scotland, Wales, and all home and foreign ports at favourable rates of freight.

Cleveland is well known as the largest iron-producing district in the world, and possesses unequalled facilities for transport both by land and by sea, while the important items of coal, coke, and limestone, necessary in the manufacture of pig-iron, are cheap and abundant, and of excellent quality. The reputation of the Cleveland iron is so well known as to need no further comment, and the demand for it has increased far beyond the existing means of production.

Special advantages for the conveyance of pig-iron from the works of this company to the port of Whitby, and all inland markets, are afforded by the Whitby and Pickering and the North Yorkshire and Cleveland Railways, which cross the estate, the rates of carriage being the same as from Middlesborough, the cost of production per ton being, however, in favour of the Esk Valley Works.

The property of which this company will enter into possession comprises an area of 400 acres, and is held on a lease of 63 years, from Oct. 1, 1859, of which, therefore, nearly 61 years are unexpired, subject to a royalty on the ironstone obtained of 6d. per ton of 22½ cwt.

According to the report of J. G. Beckton, Esq., C.E., the well-known engineer (a copy of which is enclosed with the prospectus), the quantity of ironstone on the estate is computed by him to be not less than 10,000,000 tons.

In addition to the ironstone, the estate contains an abundant supply of good brick-earth and stone, suitable for building purposes, both of which the lessees have the right of using free from royalties and all other charges.

The engineer reports that the existing works and plant are in excellent working order, that the seams now opened are conveniently situated for mining purposes and for easy and economical working, and that there are suitable sites and ample space for the erection and working of blast-furnaces, rolling-mills, &c.

A contract has been entered into for the transfer to the company of the lease of the property, with the buildings and plant thereon; also for the erection of two of the largest sized blast-furnaces, with all modern improvements and accessory works, new blowing-engines, steam-lift, locomotive engines, railway sidings, the sinking of a new shaft, the building of 75 workmen's cottages, &c., the whole for the sum of £150,000.

The company will thus possess the necessary machinery to enable them to produce 40,000 tons of pig-iron per annum, and the requisite plant for the extraction of the ironstone in quantities sufficient to keep the works in full and constant operation.

The contract further provides for the due payment of interest at the rate of 8 per cent. per annum on the paid-up capital during the construction of the works.

The contractors are under engagement, under penalties, to complete the whole of the works within one year from their commencement.

The directors will have the advantage of the local experience and assistance of Mr. John Yeoman, of Whitby, who has had the supervision of the property for some years, and who has consented to join the board as resident director.

The present condition of the iron trade is of an exceedingly encouraging character, and the consequent demand for pig-iron indicates a still greater advance in prices over present quotations.

The following extracts describe the present state and future prospects of the iron trade:—

TIMES, 16th January, 1872.—"Middlesborough, Jan. 13: The pig-iron trade of Cleveland continues in a perfectly satisfactory state. It is expected that the present high prices will increase."

MINING JOURNAL, 13th January, 1872.—"Jan. 11: The usual quarterly meeting of the North of England Iron and Allied Trades was held at the Royal Exchange, Middlesborough, on Tuesday, when the attendance of those interested in the trades was very large. The market opened firm, at last week's rates, and advanced at the close to 67s. and 67s. 6d. for No. 3, and one or two special parcels are reported to have been sold at 69s. 6d. net cash. The demand continues unabated, and the fact of the demand being for actual consumption, and not, except perhaps to a very small extent, for speculation, coupled with the limited supply, render it probable that prices will go even higher before long. From the return of the Cleveland Ironmasters' Association for last month, we notice that the make of pig-iron in December was 163,460 tons, which is 13,858 tons more than in the corresponding month of 1870. The make in this district alone of pig-iron last year was nearly 1,900,000 tons. Every department of the Finished Iron Trade is full of work."

The directors would invite special attention to the report of the engineer, J. G. Beckton, Esq., C.E., who has designed and completed some of the most successful works in the district; his great practical experience and local knowledge, therefore, constitute him a high authority on all matters connected with the Cleveland district, and the production of pig-iron generally.

In such statement it will be seen that Mr. Beckton has taken as the basis of his calculation the price of pig-iron at only 6s. per ton, whereas the present market rate is considerably higher, being over 7s. per ton.

The directors, however, are content to base their estimate of the profits of the company upon the lower quotation.

The following details, extracted from Mr. Beckton's report, show the cost of producing pig-iron in the Cleveland district, and the margin of profit which may fairly be expected to accrue:—

Taking the selling price of pig-iron (now over 7s.) say at

6s. per ton ..... £3 6 0

Deduct—The cost of raising the ironstone, and

all other mining expenses for making

1 ton of pig-iron, is ..... £0 10 6

The maximum cost of manufacture, inc.

cluding all charge whatever, is ..... 1 8 3—1 18 9

Leaving a net profit per ton of ..... £1 7 3

which, on a total make of 40,000 tons of pig-iron per annum—which will be the capacity of production of the company's works now to be erected—would be equivalent to a net profit of £54,500 per annum, or a dividend of over 27 per cent. on the capital of the company.

The growth of the iron trade in the Cleveland district has been of a steady and satisfactory character. The quantity of pig-iron made from Cleveland ore was

Tons.

In 1859 ..... 629,622 In 1865 ..... 957,311

" 1860 ..... 633,000 " 1866 ..... 1,043,527

" 1861 ..... 607,030 " 1867 ..... 1,166,963

" 1862 ..... 705,529 " 1868 ..... 1,233,413

" 1863 ..... 818,400 " 1869 ..... 1,459,508

" 1864 ..... 926,024 " 1870 ..... 1,625,277

The production for the year 1871 is stated to have been nearly 2,000,000 tons.

The success of enterprises of this class, and the estimation in which they are held by the investing public, cannot be better evidenced than by the following table, showing the present price of the shares of similar undertakings in the North of England.

Name of company. Present price.

Boleckow, Vaughan and Company (Limited) ..... £30 0 0 ..... £27 0 0

Consett Iron Company (Limited) ..... 7 10 0 ..... £15 10 0

Midland Iron Company (Limited) ..... 5 0 0 ..... £2 to £3

Parkgate Iron Company (Limited) ..... 6 5 0 0 ..... £88 to £90

Staveley Company ..... 6 0 0 0 ..... £106 to £115

With the facts above mentioned, the directors have every confidence in recommending the underwriting as an unusually favourable and safe investment.

The allotment of the shares will be made as follows:—

1.—To applicants desiring to pay up in full on allotment, but limited to 5000 shares in all, and

2.—The balance not so allotted to applicants wishing to pay up by instalments.

If no allotment be made, the application money will be returned without deduction; and should a smaller number of shares be allotted than those applied for, the balance of the sum deposited will be appropriated towards the sum payable on allotment.

Applicants paying up their shares in full on allotment will be entitled to receive interest therefrom that date, during construction, at the rate of 8 per cent. per annum, and dividends on the full amount, at first time to date.

The following are the particulars of the contracts and agreements entered into by the company:—

An agreement dated the 13th of January, 1872, made between Richard Dansey

Green Price and William Palmer, as executors of the last will and testament of the late William Watkin, deceased, and Walter Sandell Mappin, of the one part, and Charles Fraser, as trustee on behalf of this company, of the other part; and

agreements contained in letters from Charles Fraser to Walter Sandell Mappin, from Messrs. Edwin Clark, Puncard and Co., to Walter Sandell Mappin and Charles Fraser, from Walter Sandell Mappin to Charles Fraser, and from Charles Fraser to Messrs. Edwin Clark, Puncard and Co., and Walter Sandell Mappin, dated respectively 18th, 22nd, and 29th day of January, 1872.

Copies of the lease, the Articles of Association, the contracts, and the report of Mr. Beckton, and plans may be seen at the offices of the solicitors of the company.

Applications for shares must be made on the accompanying form, which must be forwarded, together with a deposit of £2 per share, to the bankers of the company. Messrs. FULLER, BANBURY, NIX, and MATHIESON, 77, Lombard-street, E.C., London; to the brokers, Messrs. HUGGINS and ROWSELL, 1, Threadneedle-street, E.C., London; or to the secretary, at the offices of the company, 12, Great Winchester-street, E.C., London, where prospectuses and forms of application may be obtained. By order of the Board, HAROLD KEMBER, Sec. Offices of the company, 12, Great Winchester-street, E.C., London, Jan. 31, 1872.

Issue of 10,000 shares of £20 each, being the share capital of THE SOUTH CLEVELAND IRONWORKS (LIMITED).

FORM OF APPLICATION.

(To be retained by the bankrs.)

To the Directors of The South Cleveland Ironworks (Limited). GENTLEMEN.—Having paid to your credit at your bankrs, Messrs. Fuller, Banbury, Nix, and Mathieson, the sum of £ ..... being £2 per share on

shares of £20 each of the South Cleveland Ironworks (Limited), I request you to allot me that number of shares; and I hereby agree to accept the same or any smaller number that may be allotted to me, and to pay the balance due thereon, according to the terms of the prospectus, dated 31st January, 1872.

Name (in full) ..... Address ..... Profession (if any) .....

Date ..... 1872 Signature.....

(Addition to be filled up if the applicant wishes to pay up in full on allotment.)

I desire to avail myself of the privilege to pay up in full on allotment the above shares, in terms of prospectus.

Signature.....

\* Since advanced to 7s. per ton, 24th January, 1872.

ISSUE OF 1500 FIRST MORTGAGE GOLD BONDS, OF \$1000 EACH, OF THE ELK AND M'KEAN RAILWAY COMPANY OF PENNSYLVANIA.

Equal at Exchange of 4s. 2d. per Dollar to £208 6s. 8d. per Bond of \$1000.

Bearing Interest at 7 per cent. per annum, payable in gold half-yearly in London or New York.

Principal redemable at par, by annual drawings within 30 years.

Secured by mortgage of railway and property.

Principal and Interest free from all U.S. Government and State Taxes.

Issued at 85 per cent., or £177 1s. 8d. for each Bond of £208 6s. 8d.

MESSRS. GOVETT, PEARSE, AND CO. are authorised by the ELK AND M'KEAN RAILWAY COMPANY OF PENNSYLVANIA to receive applications for 1500 First Mortgage Bonds of \$1000 each, payable to bearer, secured on the whole of the property of the company.

The price at which the above Bonds are offered for subscription is 85 per cent., or £177 1s. 8d. for each Bond of £208 6s. 8d. (£1000), payable as follows:—

£200 on application for each Mortgage Bond.

30 on allotment.

40 on the 1st March, 1872.

45 on the 1st April, 1872.

42 1s. 8d. on the 1st June, 1872.

£77 1s. 8d.

Deducting coupon of £7 5s. 10d., less income tax.

Payments in anticipation of unpaid instalments may be made upon allotment, or on either of the above dates, under discount at the rate of 5 per cent. per annum.

Each bond bears the certificate of the Farmers' Loan and Trust Company of New York that the whole of the company's railway, charter, and lands, now or hereafter to be constructed or acquired in the State of Pennsylvania, have been mortgaged to them in trust for the bondholders. The deed of mortgage contains full power to take possession of, work, and sell the line in default of payment of the interest or principal of the bonds.

The bonds carry interest coupons of 7l. 1s. 10s. each, payable in gold, half-yearly, on the 1st of April and the 1st of October, in London or New York, free of all U.S. Government and State taxes. The first coupon falls due 1st of April, 1872.

The due and punctual payment of the interest upon the Bonds for one year from this date, pending the completion of the line, will be absolutely secured by the deposit of £21,000 in the hands of the following gentlemen as trustees for the bondholders:—

FREDERICK ALERS HANKEY, Esq.; and

AGUSTUS HENRY NOVELLI, Esq.

The bonds can be registered at the office of Mr. Bernard Croft, 5, Austinfri

something to say about them. The Toronto, Grey, and Bruce is partially completed its line, and is proceeding with the remainder of its undertaking, having just resolved on an issue of bonds to the amount of \$168,720 with that object. The County Council of Ottawa County, in the province of Quebec, has passed a resolution in favour of granting \$200,000 as a bonus to aid in the construction of the Northern Colonisation Railway, to run from Montreal to Ottawa, on the north side of the Ottawa river. The Glasgow and Cape Breton Coal and Railway Company proposes to apply to the Legislature Nova Scotia for a concession of a line from the Reserve coal field at Louisburg Harbour. This line, if carried out, will, it is thought, enable the company to ship coal all the year round, and it will also be the command of the whole of the Cape Breton coal traffic to company. The St. Lawrence and Ottawa Railway Company proposes to extend its line from the Canadian legislative capital along the north bank of the Ottawa to Portage du Fort and Pembroke, and thence to Lake Nipissing and Georgian Bay. A contract section of the Canada Air line, between Canfield and Welland, a distance of 25 miles, has been awarded by the directors of the Great Western Railway Company to Mr. HENDRICKS, of Hamilton, the Midland of Canada is proceeding with its extensions, which will convert it into a system of some importance, and the Canada Southern is also in hand. We might prolong these details in illustration of the activity which is being at present displayed in the development of Canadian railways, but we have probably said enough to show that this activity is very considerable. Everything, of course, depends upon the continuance of friendly relations between Great Britain and the United States; but if the two great nations remain at peace we see no reason why Canada should not take at least as much of our railway iron in 1872 as she did in 1871.

#### THE CLEVELAND IRON TRADE.

The commercial reports since the commencement of the year have been unanimous in the expression of the most favourable opinions with regard to the future prospects of the iron trade, and from the vantages and reputation of the Cleveland district that district is certain to obtain at least its fair proportion of every improvement. Possibly no district recently developed has permitted such rapid realisation of large fortunes by those providing the requisite funds for enabling it out, and yet there is still as favourable opportunities as ever, the proportion of the enormous deposits hitherto worked being small that the development of the district can only be regarded as now commencing. Indeed, the position of a property with regard to works and shipping ports appears to be the chief matter for consideration in estimating the amount of profits that can be realised. The names of Bolckow, Vaughan, and Co., and other firms, are not inseparable from the district, but afford lasting evidence of what is achieved there by the judicious application of capital, accumulated by steady perseverance. For some time past the minerals beneath the Egton estate have been worked on a limited scale, the works having been chiefly confined to the sinking of a shaft to the Peecten and Avicula seams, which are found at the depth of 60 and 70 yards respectively, and the quantity raised has been about 400 tons per week. This ore has been smelted at the Grosmont and the Glaisdale furnaces, and in consequence of the death of the late proprietor, Mr. William Watkinson, interfered with the arrangements at the works, it has been determined to transfer the property to a public company, a step which will be much facilitated by the fact that the work already done has been ample to prove the value of the grant, and that its future development on a larger scale offers every prospect of great success. The SOUTH CLEVELAND IRONWORKS has been incorporated with a capital of £200,000, in shares of 20s. each, and it is estimated that a revenue of £4,500 per annum, being equal to 27 per cent. on the capital of the company, will be realised upon the completion of the works; and in the arrangements made for the extension of the number of furnaces care has been taken to provide for the payment of the shareholders of interest at the rate of 8 per cent. per annum on the paid-up capital during the construction of the works. The existing works and plant are well arranged, in excellent working order, and a contract has been made for the transfer to the company of the lease of the property, with the buildings and plant iron; also for the erection of two of the largest sized blast-furnaces, with all modern improvements and accessory works, new blow-engines, steam-lift, locomotive-engines, railway sidings, the sinking of a new shaft, the building of 75 workmen's cottages, &c., the cost for the sum of £60,000, and this will place the company in session of all the machinery necessary to enable them to produce 300 tons of pig-iron per annum, and the requisite plant for the reduction of ironstone in quantities sufficient to keep the works in constant operation. Mr. John Yeoman, of Whitby, who has hitherto had the supervision of the property, will continue as resident director, to fulfil the same duties for the company. The fact that the production of pig-iron in Cleveland increased from 633,000 in 1860 to 1,695,377 tons in 1870, and that in 1871 the make was considerably greater than in any previous year, suffices at once to show the facility for expansion, and the demand which exists for the iron which the district produces. The prospectus will be found in another column.

#### COMBINED STEAM AND CARBON ENGINE.

An ingenious arrangement of engine whereby the latent heat of steam is very thoroughly utilised is at present being tested at the Atlantic Works, Boston, U.S., and is reported to be showing extraordinary results. Mr. J. H. ELLIS, the inventor of the engine, test that the fuel now required to produce 100-horse power will, with a proper application of the heat in the exhaust steam, produce 150-horse power, showing a gain of 166 per cent. by using the combined engine. The exhaust steam from an engine of 100-horse power is to be taken to an adjoining building and used to heat a bisulphide carbon boiler which will furnish vapour sufficient to drive an engine of 166-horse power to its full capacity. No back pressure or injurious effect is produced on the first engine by using its exhaust to heat the boiler of the second one. By coupling these engines together, a machine of 266-horse power is obtained driven by the same fire previously required to produce 100-horse power. The trials at present being made are with small engines, and it is found that the vapour engine whose boiler was heated entirely by exhaust from the steam engine gave 18.8-horse power, whilst the steam engine gave but 11.3-horse power; yet both engines were made in the same patterns in the same manner—they are 10-in. cylinder 24-in. stroke, with single valves. One is run by steam in the usual manner, and its exhaust is passed through the flues of the vapour, filled with a mixed volatile liquid, consisting principally of sulphide of carbon. The heat of the exhaust steam is sufficient to convert this liquid into vapour very rapidly, and will carry the pressure up to 65 lbs. to the inch. The combined engines gave 30.1-horse power in the aggregate. With the vapour engine there is no risk of explosion, as the heat of the exhaust will not carry the pressure in the boiler above 65 lbs. under any circumstances, and if all the liquid should be evaporated out of the boiler no injury would be done, as could not be overheated or injured by the heat of exhaust steam. It is claimed that the vapour engine does not require any oiling of cylinder, valves, or rods, the fluid evaporated lubricating the engine, so that the friction and wear are considerably less than that of the steam-engine. The Ellis Vapour Engine Company, of Boston, are manufacturing combined engines, and guarantee them to produce as much power as any other engine, made with less than half the fuel, and as the engine uses no fuel, and is kept going with the same liquid over and over again, there is considered to be much to justify the claim. The exhaust vapour is condensed in a coil of inch-iron over which a blast of air, slightly moistened with a jet of water, drawn by a blower; the condensation of the vapour is very rapid, a small quantity of water, and the condensed liquid is pumped into the vaporiser continuously, so that only 35 gallons of water is required to keep the engine constantly going. Not more than a gallon of liquid (which costs about 4s. per gallon) is lost in a 20-horse engine for 10 hours, being at the rate of less than eight of a penny per horse-power per hour. Mr. Ellis's ar-

rangement also secures the condensation of all the exhaust steam which is returned to the boiler as pure hot water, thus preventing the deposit of scale and sediment.

#### REPORT FROM CORNWALL.

**Feb. 1.**—The meeting held at Truro, last week, is a good deal pooh-poohed in certain quarters, wherein it is declared that it leaves matters just as they were, and that after all the agitation the men will find themselves no better off, unless they are content to be satisfied with the declaration of the principle that they should earn more in five weeks than in four. This, however, is little more than the breaking forth of a good deal of smothered opposition that was not—possibly from prudential motives—openly manifested at that gathering. The ball has been set too effectually rolling to be stopped by any amount of mere inertia, and there are very few managers who will now care to endure a more active system of antagonism. There is a good deal being said, however, as to the actual rates of wages that the men receive, which might have been advanced with much more effect before the meeting was held, and which really does not touch the main issue. Nobody who knows anything at all about Cornish mining but is aware of the fact that in certain well-to-do mines a remarkably good average of pay is earned, without any very excessive exertion on the part of the men. Still, the success of A. in this matter by no means compensates B. for the evils of short extent, reduced rates, or averages; and C. cannot be expected to refrain from following Oliver Twiss's example and "asking for more," because A. sees little cause to grumble. It is stated that during the past year, at Devon Great Consols, the underground men (tutworkers) made a clear monthly average of 3s. 12d. 2d.; and it is said that at the Phoenix Mines the tributaries have been earning 3s. 18d. 6d., and the tutworkers 3s. 12d. 6d.; whilst at South Condron, in four weeks, November-December, the tutworkers had 3s. 18d., and the tributaries, who lucky in the matter of stumps, 3s. 10s. 9d. Of course, the last item is exceptional. There are, however, other mines, and those tolerably well known, to which the average earnings have not reached 3s. 10s., and, indeed, have frequently barely exceeded 3s. There seems always to have been a great discrepancy in the rates of mining wages earned in the county. Five-and-thirty years ago, whilst the average of the whole of Cornwall for tributaries had been 3s. 18d. 2d., of Penzance the men only got 2s. 7s. 6d.; whereas in the St. Austell district they had 3s. 19s., and in the midland district 3s. 8s. In the tutworkers the extreme difference on an average of 2s. 12s. 8d. was actually 1s. 8s. At that very time, in the Consolidated Mines, tributaries were averaging 4s. 5s., and tutworkers 3s. 11s. 6d. Figures such as these show the folly of endeavouring to draw general conclusions on either side of the question from isolated instances, and fully justify the wisdom of the form of the decision of the meeting, as well as the decision itself. It cannot, however, be expected that in times when communication between different parts of the county is so much more frequent and easy than it was thirty or forty years ago, such great variations of pay should continue.

Not a little of the opposition to give men the full advantage of the five weeks, as against the four, is based upon a very natural, but at the same time a very gross, blunder, and one more to have been expected in the amateurs who have been drawing such absurd pictures of Cornish mining in non-professional papers, than in those who are "native to the manner born." The blunder is, that to give the men more pay it is absolutely necessary to increase the rates of pay for the work done. And that this is a blunder will be seen at once when it is remembered that to a great extent the men's wages have been kept down, not so much by an actual reduction of prices as by a compulsory waste of time. If the men had always been allowed to earn what they could, even at the ordinary contract figures, the five-weeks month would never have created any stir; nor, as the men are only paid by results, would the adventurers have been a penny the worse. They might have expended more money in a given time, but more work would have been done in return. Indeed, it is easy to show that they would have been in such cases actual gainers. The cost of draining is the same whether the men work one, two, or three, and so are the bulk of the plant charges; and the quicker a mine is developed the ampler are the returns on the capital thus invested. There is little fear, in spite of all the new projects, that if this idea were fully carried out under present circumstances the tin-market would be overstocked. One of the best authorities in the county has declared that to work the mines as they ought to be worked would require 1500 more skilled miners than Cornwall now possesses.

Another week has passed over, and still the threatened drop in tin has not taken place. The smelters have made up their differences—which by no means operated to the disadvantage of the producers upon all occasions—and have agreed upon the system of ticketing indicated in the following circular:

"At a meeting of tin smelters held at Redruth—present, Mr. G. Williams, Mr. T. R. Boltitho, Messrs. Daubuz and Co., Mr. W. H. Tregeoune, Mr. R. K. Michell, Mr. A. Lanyon, Mr. D. B. In, Mr. R. M. Sampson, Mr. E. Michell, Mr. Francis Michell, and Mr. T. S. Boltitho (the Tamar Company subsequently signing their assent)—it was resolved—that the system which has lately prevailed of purchasing ores by tender sent to the mines is found to be very inconvenient and in other respects objectionable. That with a view of facilitating the sale and purchase of ores by tender, it is desirable that ticketings should be held on two days in each month. That the Monday would be the most suitable day as far as the smelters are concerned, but if hereafter the miners should prefer any other day, the smelters would be glad to confer with them on the subject. That it be left to the miners to determine the places for holding ticketings, but that till something is settled by them the smelters suggest that ticketings on the second Monday in each month be held at Redruth, and the fourth Monday at Truro. That in such cases the ores should be sampled on the Thursday preceding the day of sale by the smelters' agents (except in cases where any smelter may request the mine agent to send samples), and with the distinct understanding that no addition be made to the ore after the samples have been taken. That all ore sold by tender be paid for by bill at 30 days from the date of completion of delivery. That no expense that may be incurred by any smelters' agents at any ticketings shall be chargeable to the mines. That these regulations take effect from the 1st of February. That a copy of these resolutions be sent to the mine agents interested.—THOMAS S. BOLITHO, Chairman."

This document has by no means approved itself to some of the most acute of the mine agents interested," who think they see in it a still firmer establishment of the old monopoly against which they have so often protested. The smelters declare that it is necessary for their protection, as under the system of tender they have not always had a fair opportunity of taking the samples, and in sundry instances have been "dodged" by parcels being mixed after the samples had been taken. Producers and smelters seem to be "natural enemies."

Mr. Brydges Willyams, M.P., will set out at once on his visit of inspection to the Great Emma Silver Mines, Utah. He has paired for the time of his absence, which will not extend over a couple of months.

#### REPORT FROM LANCASHIRE AND CHESHIRE.

**Feb. 1.**—Notwithstanding the increased rates, there is much enquiry for iron ore of all descriptions, the supply being very irregular, and far below the demand. This seems to forbode still higher prices, and diligent attention is being paid to sources of supply more remote than those which have hitherto mainly furnished us with this material. It is announced that the Wigan Coal and Iron Company have leased a portion of an estate near Belleek, in Ireland, where a rich bed of hematite has been discovered. The manufactured iron trade has never been more brisk, and it is very difficult to settle quotations. The output of coal continues short, the scarcity of labour cripples trade to a great extent, and the complaints of the difficulty in getting orders executed are very numerous.

The Parliamentary Committee of the District Coal Association met at a deputation of Skelmersdale Colliery proprietors on Tuesday, at Manchester, concerning the proposed railway amalgamation. It is probable that a powerful deputation from the coal trade will wait either upon the Premier or the President of the Board of Trade soon after the meeting of Parliament, and arrangements are in progress for an expression of opinion, to be conveyed in a similar way, from the principal Lancashire boroughs. There is an opinion prevailing here that for purposes of enquiry the Bill promoted by the companies will be shelved, for this session at least.

Concerning the Mines' Bill, the Members of Parliament for Wigan—Mr. Woods and Mr. Lancaster, both extensive colliery proprietors, have, in their annual address to their constituents, expressed themselves in favour of a clause abolishing the use of gas-lamps in mines, or portions of mines, where safety-lamps are required to be used. Mr. Lancaster elicited hearty cheers when he announced that in the event of the Government failing to introduce a provision authorising the payment for coal-getting to be by weight he should prepare to move an amendment to that effect.

The Salt Chamber of Commerce has laid complaints to the Home Secretary, that the Nuisance Committee of the Northwich Union has exercised undue severity in carrying out the provisions of the Act with reference to the Smoke Nuisance prosecutions of the salt proprietors, upon whom, since 1867, fines and costs to the amount of £787. 8s. 4d. had been inflicted. An Inspector from the Home Office has held an enquiry, and at the close he expressed the opinion that the committee had not exceeded its powers, or used undue severity. He expressed his surprise that, while individual proprietors seemed to have tried to escape the smoke, no general action had been taken by them as a body.

The question as to the safety of conical winding-drums, respecting which an important mining prosecution recently took place at Wigan, arose at an inquest, held to-day, touching the death of a man named Roebottom, who had been killed at Messrs. Evans's Ram Pits, Haydock, on Jan. 22, under peculiar circumstances. The accident, which resulted in the death of the deceased, and in serious injury to several other workmen, had been attributed to the slipping of a rope on a conical drum, and the enquiry had been adjourned, in order to obtain the opinion of Her Majesty's Inspector of Mines for the district. It appeared that a new spring was being placed in one of the safety-catches used for holding the cage when at the surface, and in order that this might be reached the cage was raised, and a wooden bearer placed beneath, resting on each side of the shaft. The repairs having been completed, the cage was raised so that the bearer could be drawn out. Immediately a number of men, who were waiting to descend, entered the cage, and the deceased was about to follow, when the cage suddenly shot about 9 yards down the shaft, inflicting fatal injuries upon him, and severely shaking and bruising the others. The engineer was of opinion that the relaxing of the rope while the cage rested on the bearer had caused one of the turns of the rope to coil over another, and when the weight of the cage and of the men came upon it it slipped off Mr. High, the Government Inspector, said the drum was not one of which he approved. The accident occurred in consequence of the cage not having been run down and up the shaft, as appeared to have been the practice after repairs of this kind, but in this instance the engineer said he did

not know the men were getting into the cage. The drum was not very steep, but he never thought them safe if they rose at all. He hoped before the close of the session to have a law to reach even this case. There must be great caution, or a similar accident would again occur.—The Coroner said that as Mr. High had seen the drum before the accident, and the question being one of engineering, it was not for the jury to interfere in a matter which rested between the Inspector and the owners of the colliery.—A verdict of "Accidental Death" was returned.

#### TRADE OF THE TYNE AND WEAR.

**Feb. 1.**—The Coal and Iron Trades here continue to prosper in a marvellous manner; so great, indeed, is the demand for coal and coke that very many firms cannot get a sufficient supply to keep their works fully going. The demand for iron, especially ship-plates, is also very great; an enormous number of steam ships of large tonnage are in course of building on the Tyne and Wear, and of course the demand for marine engines and boilers is very great, and this keeps all the engine-works, foundries, and iron manufactures fully employed. There is also a great demand for locomotives and other engines.

It is generally considered that the iron shipbuilding trade is, or will be shortly, overdone, and that a strong reaction sooner or later must take place in this trade, which, of course, must also have a bad effect on the coal and iron trades in the long run. This appears to be the rock ahead at present, and it would be well for all parties concerned to act with caution. The large profits realised in the steam shipping trade has caused a mania which has not been experienced since the great railway mania, and, as remarked above, a reaction must take place at no distant date.

Coal miners here are earning excellent wages, and the boys employed are at many works only working eleven hours instead of twelve, as formerly; this arrangement will soon become general throughout this district. The attention of the men is now generally directed to the question of yearly bittings, and the leaders are working hard to persuade them that they must refuse to enter into those yearly engagements. They evidently assume that the present rate of progress is certain to be maintained, but they ought not to forget that this to a great extent is a speculation. It is evident that a reaction might take place during the ensuing year, and should this happen the rates of wages must fall as rapidly as they have risen: it would, therefore, be well to pause before refusing a yearly engagement on excellent terms. It is certain that when the time arrives for renewing those yearly engagements, which will be shortly, very good terms indeed will be offered, and those terms ought not to be rashly refused. A series of meetings have been held lately at Crook, at Rainton, and other places, and at all those meetings the leading speakers have, without exception, denounced the yearly agreement; they have, indeed, no other cry they can resort to at present.

#### THE SEAHAM COLLIERY EXPLOSION, AND INQUEST.

The adjourned inquest in this remarkable case has now been concluded, and we know all that we are likely to know of the cause of the calamity. A most searching enquiry has been conducted by Mr. Maynard, and several accomplished mining engineers gave their time and attention to it. Mr. Dakers, the resident manager of the pit, after making a minute examination of the workings, arrived at the conclusion that the explosion occurred at No. 2 bank head, that a fall had taken place there, and a large quantity of gas had exuded from the strata above, and that the gas had been ignited by Spence, the master-shifter, taking his lamp top off, this point being within the limits where naked lights were used. This view as to the seat of the explosion was concurred in by all the eminent mining engineers examined, and also by many practical pitmen who were not examined. The course of the blast was, from this point in every direction. It is, it must be admitted, a most remarkable case, as blowers generally burst out when the coal is first worked out, and in this respect, so far as we are aware, this is the only case of the kind which has occurred. The explosion, it will be remembered, was one of a very severe character, and this need excite no surprise, as a large quantity of gas liberated at a point where a large quantity of fresh air was passing was certain to produce a violent explosion.

When the explosion occurred the pit was explored by a band of men, led by the underviewer and other officials, and good progress was made until the point was reached where the stables were on fire. Ten hours had now elapsed since the explosion had occurred, great exertions had been made to surmount the falls of stone, and clear away the after-damp and four air, and so far their exertions had been crowned with success. But it was now found that a strong fire existed in the stables; the hay had caught fire, and the woodwork and coal had also been ignited, and thus a raging fire of a serious character barred their further progress, and this prevented them reaching the men, more than 20 in number, who were still at a considerable distance beyond. It was found, too, that all the ponies had been killed by the after-damp, and it was concluded that the men must also be dead; of this no doubt was entertained, and it was feared, justly, that if any attempt were made to carry fresh air further in to get at the fire another explosion would occur. It was, therefore, determined to close up the pit as the only safe course to pursue. The managers of the mine consulted several eminent engineers, and this was the course determined upon.

When the dams were again taken out it was found that the fire was extinguished, and it was also found from records made by the men who were shut in that they had survived a much longer period than was supposed. On Monday morning David Ballantyne inscribed on a piece of wood, "John Hay died at seven o'clock; all the rest alive at ten A.M." More than eleven hours had elapsed since the explosion had occurred, and it may be attempted to conceive the amount of anguish those poor men had endured, unable to escape from their prison, and waiting for the rescue which, owing to the unfortunate firing of the stables, could not be afforded. It is evident that had this untoward circumstance not occurred nearly all the men would have been speedily rescued alive by the brave band of explorers.

From a careful study of this remarkable case some useful lessons may be learned for our future guidance. It is evident that so long as a man has not been found it may be hoped that he may be imprisoned in some recess, and may still be alive; and this may possibly lead in some cases to the saving of many lives. It is evident that when the air currents are cut off by fire, and stoppage being blown out, a sufficient quantity of air capable of supporting life may be contained in any district or portion of workings, and men may live there for a very long period.

But the most important lesson which may be derived from this case is in connection with the occurrence of fires underground after the explosions of gas, and the necessity for having some means at hand for extinguishing those fires. There is always a danger of fire underground from boiler fires and furnaces, and where naked lights are used in dry dusty pits fires very frequently occur from sparks from candles and open oil lamps. Some means of extinguishing these fires is certainly to be desired, and in deep mines, indeed in nearly all mines, there is water tubbed back near the surface, and a pipe can be taken from the tubbing down the shaft and along the main roads, and if this were once established, and taps provided at certain intervals, a fire occurring in any of the main roads could be speedily extinguished. Of course the pressure got in those depend upon the vertical height of the reservoir in the shaft, and the rise or dip of the workings, but as a rule the pressure would be enormous, far exceeding any pressure got when fire-engines are used on the surface, and without doubt such an apparatus would give the means of speedily extinguishing any fire which might break out in the main roads, and that is precisely where such fires occur, causing great mischief, and frequently loss of life and property.

#### REPORT FROM SCOTLAND.

**Jan. 31.**—The Iron Market has been exceedingly strong since the date of my last report, and a large business has been done in all kinds of iron. The price of warrants advanced steadily until Monday, when 7s. 6d. cash was paid, and the closing price that afternoon was 7s. 4d. On Tuesday the market opened quietly, and the price of warrants gave way during the forenoon to 7s. 7s.; on late Change sellers were more pressing, and buyers very timid, business being done down at 7s. 3d. 3d. cash, at which sellers remained. To-day the market was again flat, in sympathy with the stock and share market, and after a fair business done very irregular terms closed with buyers at 7s. 9d. cash, and 7s. 3d. one month, sellers asking 3d. per ton more. Makers' iron still continues to lead the market, and from the undenoted quotations, it will be seen that another decided rise in prices has taken place:—

	No. 1.	No. 2.
Gartsherrie at Glasgow (deliverable alongside)	9s. 0d.	8s. 0d.
Coltness ditto	.. 9s. 0 ..	82 0
Sunmerries ditto	.. 9s. 0 ..	80 0
Carnbroe ditto	.. 9s. 0 ..</td	

at a reduction from list prices. The spring demand for shipment—not yet placed—will have to pass into masters' books at the advance, or be withdrawn to a more convenient season. Only it is expected that the first demand will be accompanied with such exigency that present high prices may yet be exceeded. The locomotive and engineering works are very full of orders; boiler-makers are as busy as they can be, the rivet works are fully engaged, ironfounding is getting better, and the copper-workers and brassfounders are behind with delivery, especially the former. The last-quoted prices are firmly held.

The pretty united action which is being taken by the colliers, through the instigation of agitators, to secure a uniform eight-hour day throughout the colliery districts of Scotland, coupled with intermittent breaks in their time to attend mass or delegate meetings, is seriously interfering with the output and price of all kinds of coal, and even hindering manufacturing processes. A further increase of wages of 1s. per day is also sought to be secured by the same means. These costly idleness and reductions in the hours of labour are giving serious trouble to masters, who have always regarded the "labourer as worthy of his hire," and are compelling them to refrain from accepting contracts at given prices extending over several months as formerly. This will enable them to take advantage of a rising tide more speedily, but in the meantime it will derange commercial arrangements, and, perhaps, inflict serious injury on all concerned. The prices of all kinds of coal keep high, and those who have access to the open market, unencumbered by contract arrangements, are realising good prices, but in numerous instances coals are being delivered at prices current last July. During the week the foreign and coastwise shipments are returned at 30,650 tons, against 24,323 tons in the corresponding week of last year. We understand that Mr. Yates has entered on a lease (under Col. Buchanan, of Drum-peller) of the coal and ironstone in the pits adjoining his quarry at Auchinleck. The Coltness Iron Company are about to sink a pit at Muirhead, near Shotts.

The keepers of colliery engines in Fifeshire have memorialised their employers for an advance of from 6d. to 9d. per day, in order to bring up the wages to 4s. per day. If the demand is not complied with, a strike is to take place, but it is expected the advance will be granted.

From the Clyde shipyards the following launches have taken place—a screw-steamer of 650 tons, named the Campanil, owned in Cardiff, and to be employed in the Spanish ore trade. A screw, named the Selica, of 900 tons, owned by Mr. Servais, of Antwerp, for the Eastern trade. A screw of 240 tons, named the Pantheon, for goods and passenger traffic in the eastern portion of the Mediterranean.

The Tod and MacGregor (Limited) Company is not to be carried through, we learn, on account of the applications for shares not having been sufficiently numerous throughout the country. The firm will, therefore, remain unchanged, and the deposit money paid by applicants for shares will be forthwith returned.

The First Division of the Court of Session decided on Saturday that the West Calder Oil Company were not liable for the deaths of John Shaw and his sons. The deceased were killed by the breaking of a rope at the Gavelside shale pit, and the damages claimed were £400. The company's answer was that they were not liable as the Shaws were not in their employment, but in that of Hobt. Boyd, a contractor, who was performing the work under agreement with the company. The lord ordinary, Lord Ormrod, directed the jury in accordance with this view, and a verdict for the defendants resulted. The plaintiff's counsel excepted to the direction, and now came before the Court on their bill of exceptions. The contract was produced, and showed that the contractor was not a servant of the company. The Court, without calling for a reply, unanimously disallowed the exceptions.

#### REPORT FROM NORTH AND SOUTH STAFFORDSHIRE.

**Feb. 1.**—The Coal Trade of South Staffordshire is in a very buoyant condition, and quotations are exceedingly firm. Households range from 14s. to 16s. per ton; mill and forge, 11s. to 12s. 6d.; lump, 10s. 6d. to 12s.; and slack, 6s. to 7s. 6d. On the Wolverhampton side of the district a further advance of 1s. on coal and 6d. on slack has been established this week. On the Dudley side these quotations are exceeded, best thick for household purposes realising 18s. per ton, and upwards. Even at these almost unprecedented quotations the iron-masters and other large consumers suffer serious inconvenience from the difficulty in getting in their supplies, and they are, to a large extent, dependent on the produce of other districts. Gas coke has this week been advanced to 16s. per ton, being an increase of 1s. on previous rates. The market for ironstone is exceedingly firm, the supply being still unequal to the demand. Best native stone is selling at 20s., gubbin 17s. 6d., and white 18s. per ton, and quotations have a tendency to advance. Large quantities of Cumberland hematites, Welsh bars, and Northampton ores are coming into this district to make up the deficiency in the local supply.

The Iron Trade of South Staffordshire shows increased firmness this week, consequent on the further wages concession made at Wolverhampton on Wednesday. Bars range from 10s. to 11s.; plates and sheet, 11s. 10s. to 12s. 10s.; hoops, 10s. 10s. to 11s. 10s.; nail sheets, 10s. 15s. to 11s. 10s.; and angles, 11s. 6s. to 12s. 10s., per ton. The maximum prices quoted are, however, only obtainable by a few of the leading houses. The orders booked this week have not been very numerous. Buyers have not been wanting, but there has been reluctance on the part of producers to enter into fresh contracts in the present excited condition of the market. The pig-iron makers have, as a rule, sufficient contracts to absorb the whole of their produce for the current quarter; but where this is not the case, an advance is asked on quarter-day prices. Best natives are firm, at 4s. 18s. to 5s.; collets, 4s. to 4s. 5s.; and cinders are realising 4s. per ton.

Attention is being directed to the need for some united and effectual system of drainage in South Staffordshire, and particularly in the Tipton and West Bromwich districts, where it is estimated that some hundreds of acres of valuable coal which cannot at present be worked might by some general drainage system be rendered available, to the great advantage of the district, which is now suffering so much from the deficient coal supply.

In North Staffordshire the demand for coal is great, with, however, only a limited supply. The failing through of the drainage scheme is much to be deplored, and the consequences of allowing the flooded mines to remain in their present state threaten to be very serious not only to the proprietors themselves, but also to the district generally. Ironstones—the produce of North Staffordshire—command a very active sale, at 19s. to 21s. per ton, delivered in the southern part of the county. The ironworks are in active operation, although the yield in some instances might be increased but for the prevailing scarcity of fuel.

Black Country hardware is in well-sustained demand, both in the home and export branches. Steam and gas-tubes, foundry work, mill and forge machinery, and builders' requirements, are among the leading features of enquiry. At the railway rolling-stock works the orders on hand are very numerous, and will absorb the produce for some months to come.

At an adjourned meeting of the members of the Tipton Mine Drainage Association, held at the Birmingham Chamber of Commerce on Thursday, it was decided that the Association, owing to the want of time to obtain an Act of Parliament giving compulsory powers before the present compact terminated, should enter into a temporary arrangement, and carry on the drainage for another 12 or 18 months.

**SCIENCE IN THE MINE.**—It is seldom that we have had the gratification to publish a paper which has given more satisfaction than that which appeared in the Supplement to last week's Journal, having the title of "Science in the Mine," read at the South Staffordshire and East Worcestershire Institute of Mining Engineers annual meeting, by Mr. Tom Parton, F.G.S., of Willenhall. The paper does not profess to be such a disquisition as might be expected from such an authority as Mr. Warington Smyth, but it is one which, whilst it does its author very great credit, is such a production as young mining engineers may read with a large amount of professional advantage, whether it be taken as an introduction to the complete study of the branches of science of which it treats, or whether it be regarded as a *résumé* of that with which men of experience and culture in the mining engineers' profession have made themselves acquainted.

**THE LATE COLLIERY CATASTROPHE NEAR WEST BROMWICH.**—Last Friday an adjourned inquest was held at the Clayton Arms, Swan Village, before Mr. E. Hooper, district coroner, respecting the death of the seven unfortunate men and boy who were killed at the Black Lake Colliery, on Nov. 22. Mr. Dugdale (Dugdale, Lewis, and Lewis, Wallsall) appeared on behalf of the proprietors of the colliery (Messrs. Horton and Sons); and Mr. Mottram, Oxford Circuit (instructed by Mr. Shakespeare), attended on behalf of the relatives of some of the deceased. Mr. J. P. Baker, Government Inspector of Mines; Mr. David Peacock, mining engineer, who had been appointed by the coroner to report upon it; Mr. Henry Johnson, mining engineer, for the owners; and Mr. Isaac Horton, the proprietor, and Mr. John Lawley, the manager of the colliery, were also present. Mr. John Field, Mr. Richard Mason, and Mr. John Gething, mining engineers, who had taken an active part in the recovery of the bodies, were also present. The jury returned the following verdict:—"It is our unanimous opinion that the fire originated in the horses' stable, and that the lives of the men and boy were sacrificed in consequence of their own carelessness and negligence in sleeping in the pit, but more especially of the night deputies who were left in charge of the pit. After a personal inspection of the pit by one-half of the jury, it is our opinion that Mr. Lawley, mining agent, is exonerated from all blame. We also consider great credit is due to the mining engineers who rendered such valuable assistance in conducting the attempt to rescue the bodies prior to the closing of the pit.—Messrs. Baker, H. Johnson, J. Field, R. Mason, Thos. Williams, J. Williams, J. Gething, and others."—[We regret a pressure on our space compels us to postpone the evidence.]

**RAILWAY ROLLING-STOCK COMPANY.**—The half-yearly meeting was held at the offices of the company, Wolverhampton, on Tuesday, Mr. J. Perks presiding. The secretary (Mr. John Underhill) read the report, which stated that at the last half-yearly meeting the directors informed the shareholders that several large contracts had been entered into, the effects of which would be visible in the future. In accordance with these anticipations, the present balance-sheet was much more satisfactory, showing a profit of £1304. 18s. 6d., as against £2237. 1s. 1d. in the former half-year. The increase arose from the full employment of the capital of the company, instead of a large balance remaining in the bank at a low rate of interest. As there was now a greater demand for wagons and carriages than for some years past, the directors trusted they would have no difficulty in getting new contracts during the present year. During the half-year 362 wagons had been sold, and 136 carriages and wagons

had been bought, leaving 3324 in the possession of the company. As the purchases had been chiefly in passenger carriages, the stock was of considerably higher value, though in diminished numbers. The directors proposed to pay the usual rate of dividend on the ordinary and preference shares—on the ordinary shares, at 12 per cent. per annum, 42000/-; redeemable preference, at 6 per cent. per annum, 8771. 10s. 2d.; irredeemable shares, at 6 per cent. per annum, 2261. 1s. 9d.; total, 7569. 6s. 11d. After paying these amounts, and giving credit to the reserve fund for dividend on its shares, such fund would be increased by 931. 19s. 1d. The dividends, if approved, would be paid immediately after the meeting.—The report was adopted, the dividend declared, the retiring directors and auditors re-elected, and the usual votes of thanks passed.—The Chairman said he was glad to see that a turn in the tide of their affairs took place last year. For the last year or two a part of their capital was unemployed, and they had had to take from their reserve fund to make up their dividend; but on this occasion they had been able to add a little to that fund. The state of trade enabled them to look forward to yet more prosperous times.

#### REPORT FROM MONMOUTH AND SOUTH WALES.

**Feb. 1.**—Immediate business in the Iron Trade cannot be pronounced brisk, although the trade is in a flourishing condition. This apparently anomalous state of things is not very difficult to explain, the fact being that, quotations having gone up so much of late, buyers are not willing to submit to the prices quoted, and will only give out orders when it is really urgent that they should do so. This was the result anticipated by the majority of makers when the advances in prices were made; and as they have yet many important engagements on their books incomplete, they are in no way anxious to undertake new orders only to meet actual requirements, and such orders consumers cannot well avoid placing in the market. The scarcity of fuel and raw material have still the effect of checking operations, although the works are as well employed as they can be under the circumstances, and large quantities of finished iron are turned out. Added to the difficulty of obtaining adequate supplies of fuel and raw material is the scarcity, which is being more and more felt in some departments, of skilled workmen, and also the un-settledness of the wages question, which is again beginning to give the iron-masters a good deal of trouble. Makers will be very cautious in entering into transactions, and to avoid above all things committing themselves to engagements that would be likely to take some months in execution. Prices of materials cannot be fixed for any length of time, and while so much uncertainty exists business cannot be carried on freely. The enquiry for railway and bridge iron on South American account and the clearances to the Southern markets are likely to continue large until the opening again of the shipping season to the North, which will not be long hence if there be a continuation of the present mild weather. The exports of steel and iron rails will in all probability be very large, and makers need prepare themselves for the demand. In fact, advice from every quarter point to extensive requirements of rails, bars, plates, and staves, and there is every reason to believe that the trade will be brisk throughout the year, if not for a longer period. Some of the works continue extensively employed on home orders for rails, bars, plates, and such descriptions, and good prices are still obtained. It may be said, however, that the reports which had been circulated to the effect that 8s. to 9s. were offered in London for rails is not to be relied upon as showing the position of the trade; and, if the average of the orders in the masters' books were taken, it would be found that 7s. was the current price. It is true that for contracts to be immediately delivered exceptional prices have been offered, but few makers have been able to undertake these contracts, owing to the pressure of orders already on their books. In the Tin-Plate Trade there is hardly any change to report. The demand continues much about the same, and the works are tolerably well employed. In regard to prices makers experienced but little difficulty.

The dispute in the steam coal trade, to settle which a court of arbitration has been sitting at Cardiff since Monday, was amicably settled on Thursday. The masters conceded an advance of 2½ per cent. for the past six months, and a further advance of 10 per cent. from this time forth. It was also agreed that future advances and regulations shall be determined by the rate of wages paid in the ironworks generally, but no rise or fall in wages payable to colliers in particular ironworks, independently of any general rise or fall, shall affect the 2½ per cent. payable to them for the past six months to the formation of a permanent insurance fund against accidents, to supplement it by an equal sum, it is calculated that the joint contribution would amount to £5,000.

The large demand from the foreign markets continues undiminished, and current prices remain high. The exports during the week have not been large, owing to the causes already mentioned. Several new openings have recently been made in the Rhondda Valley, and a large tract of land has just been purchased at Mountain Ash by a new company for the purpose of sinking.

In the House Coal Trade very serious complications have arisen this week, and more particularly so in Monmouthshire. The men employed at the Abersychan Collieries and at the Blaenavon Iron Companies' pits have been on strike nearly the whole of the week, owing to a dispute whether the advance of 10 per cent. in wages should take effect at once or commence on March 1, as proposed by the masters. Several meetings were held to discuss the matter, and the oldest and most respectable men expressed a desire to accept the masters' terms and resume work. It was strongly hoped that by the end of the week the great majority of the men would have returned to work.

A very shocking accident has occurred at a new coal pit being sunk for the Messrs. Prothero, at Blackwood, since a report. Shortly after the men engaged in sinking had returned to work, after having fired a shot, the timbers fixed to support the sides gave way, and five of the unfortunate men were killed. The bodies were not recovered until Wednesday.

The arrivals at Swansea include—the T. G. V., from St. Malo, with 108 tons of zinc ore, to order; Maggie, from Bilbao, with 213 tons of iron ore, for Cwmavon Works; Huasco, from Potosi de Azucar, with 625 tons of copper regains, for Richardson and Son; St. Brandon, from Bilbao, with 165 tons of iron ore, for Holway Brothers; Sun-bine, from Bilbao, with 350 tons of iron ore, for T. Wood and Co.; La Forte from Bilbao, with 153 tons of iron ore, for Poulardre and Meunier; Eudeline, from Carvalho Baja, with 443 tons of copper regains in bulk, for H. Bath and Son; Lynwood, from Port Nolloth, with 350 tons of copper ore, for Richardson and Co.; Antelope, from Bordeaux, with 70 tons of pitwood, for Poulardre and Meunier; Ethel, from Bilbao, with 330 tons of iron ore, for Poulardre and Meunier.

#### REPORT FROM DERBYSHIRE AND YORKSHIRE.

**Feb. 1.**—The Iron and Coal Trades of Derbyshire are alike active. The production of iron is larger than it ever has been. At Sheepbridge there are five furnaces in blast, at Wingerworth 3, Clay Cross 3, Derby 3, with a fourth now in course of construction. At Staveley, Codnor-park, Stanton, Alfreton, and Renishaw also a large quantity of pigs are being made. The two furnaces at Oakenhope are still standing, although they are well situated for doing an extensive trade, being close to the Oakenhope Company's pits, and also to the Midland Railway. In Manufactured Iron business continues excellent, not only in mill, but in forge and foundry material, girders, plates, gases, water and water pipes are all in request. The strike at the collieries of Messrs. Wright and Jessop, trading under the name of the Butterley Company, was brought to a close on Thursday; and the men, to the number of about 300, resumed work on Friday and Saturday, mutual concessions having been made. One of the evils attending the working of coal is the appointment of stallmen and petty contractors, who employ men under them; and as is too often the case the working man is not the most liberal of employers, and is too apt to grind those who are, unfortunately, placed under his power. This has been the case at many places in the county of Derby, and is a fruitful source of discontent. Letting a man work on his own account will always be found more satisfactory than by allowing him to become a servant of his equal, and it is hoped that the colliery proprietors will do away with a system which has not worked well in any place that we are aware of. At present, or at least a few days ago, there was a case in point. The labourers engaged at some of the collieries belonging to Mr. Seeley, M.P., it appears have been employed under small contractors, and the latter have given notice of a reduction of wages from 3s. 6d. to 3s. 3d. per day, and to pay five and a half for six days full work. Any system by which a state of things should be tolerated must be bad indeed, lead to discontent, and ultimately to a stoppage of business. It is, therefore, not to be wondered at that the men under such petty contractors have given notice that they will not accept the terms offered.

The Sheffield trades are all very busy, and the wages question continues to crop up in several branches, and there is no doubt but in many cases advances will have to be made, seeing that employers cannot afford to have their works stopped. The two great companies engaged in the production of heavy armour plates continue very busy, and we hear of plates of greater size being produced than have ever been rolled previously. The rail mills are also running as hard as they can. Makers of Bessemer steel were never busier than at present, and there are now orders in the market for 1000 tons of Bessemer rails, plates, tyres, and axles. There are also in very active request, not only for home consumption, but for exportation. The makers of files have scarcely ever had a busier season. America, the colonies, and France have of late sent some considerable orders, although the colonies are not in such a settled state with regard to the tariff on goods imported as could be desired. Both table and spring knife cutlery is in good request, especially the superior qualities, a considerable quantity being sent to the States, Australia, &c.

The Coal Trade throughout the whole of South Yorkshire is active. In household qualities the London merchants have been endeavouring to obtain a reduction in the price, and have consequently not ordered so largely. Colliery proprietors, however, have not, as a rule, given way, seeing that they have other markets for their produce. For the season, however, the house coal trade is not so brisk, but this, to some extent, is due to the open character of the weather. Still stocks are not to be found at any of the pits, all being sent off as fast as brought to the top. Steam coal continues in such demand as was never before known at this period of the year, a very large tonnage being sent by rail to London, and also to several of the depots on the Thames. From Goole also some very heavy shipments have been made to the Thames, Inverness, Wisbech, and Nantes. The South Yorkshire Steam Coalowners' Association are now in full swing, sending largely, at the present time, to Hull for shipment to France. From Grimsby also excellent business is being done. Gas coal, engine fuel, and coke are being sent to the South of England and Lancashire in large quantities. During the week several meetings have been held at Rawmarsh of the colliers in the employ of Earl Fitzwilliam, and who have decided to join the South Yorkshire Miners' Association. We may also state that a number of the men lately on strike at the Butterley Company's pits expressed a desire to belong to the same body.

**RAILWAY ROLLING-STOCK COMPANY.**—The half-yearly meeting was held at the offices of the company, Wolverhampton, on Tuesday, Mr. J. Perks presiding. The secretary (Mr. John Underhill) read the report, which stated that at the last half-yearly meeting the directors informed the shareholders that several large contracts had been entered into, the effects of which would be visible in the future. In accordance with these anticipations, the present balance-sheet was much more satisfactory, showing a profit of £1304. 18s. 6d., as against £2237. 1s. 1d. in the former half-year. The increase arose from the full employment of the capital of the company, instead of a large balance remaining in the bank at a low rate of interest. As there was now a greater demand for wagons and carriages than for some years past, the directors trusted they would have no difficulty in getting new contracts during the present year. During the half-year 362 wagons had been sold, and 136 carriages and wagons

#### INVESTMENT REVIEW A Monthly Record of COMMERCIAL AND FINANCIAL PROGRESS.

Edited by JOHN ROBERT PIKE.

The present number contains, among other useful and interesting information of all classes, the following articles:—Co-<sup>t</sup> Book Specie, Limited Liability, Profits of British Mining, the Investment Market, Mines, Hydraulic Mines, &c.

Investors and speculators will find in this Review much information to be obtainable. The selection of dividend and progressive mines is to be wonderfully remunerative at present prices.

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M. R. J. S. M. E. R. ASSAYER AND ANALYTICAL CHEMIST,

SWANSEA.

**HAUPT'S BORING MACHINE.**—Messrs. McLean and Co., Scribe, Paris, have been diligently prosecuting the perfection of Haupt's rock-boring machinery ever since its invention was first noticed in the *Mining Journal*. They have kept silence until the success of the machine was beyond doubt, and are now about to bring the matter prominently forward again.

**LEAD.**—The exports of lead—that is, pig, rolled, sheet, pipe, tubing—from the United Kingdom last year were 44,787 tons, 47,802 in 1870, and 48,365 tons in 1869. In the first total figure for 3041 tons, against 3162 tons in December, 1870, 1869, the United States were our largest importers for lead last year, having taken 10,995 tons, against 11,214 tons in 1870, and 11,422 tons in 1869. We also sent 9536 tons last year to China, as compared with 12,142 tons in 1870, and 12,000 tons in 1869. The value of the lead exported in December 1869, was £1,000,000, against £1,000,000 in December 1870

## LONDON AND COUNTY BANKING COMPANY.

ESTABLISHED 1836.

Capital £2,500,000, in 50,000 shares of £50 each.

Paid-up capital £1,000,000; reserve fund £500,000.

## DIRECTORS.

CHARLES ALEXANDER, Esq.  
JOHN TYRINGHAM BERNARD, Esq.  
DIP PATTON BLYTH, Esq.  
THOMAS STOCK COWIE, Esq.  
EDWARD FRANCIS, Esq.  
EDWARD HARRISON, Esq.  
GENERAL MANAGER - WILLIAM MCKEAN, Esq.  
CHIEF INSPECTOR - W. J. NORWELL, Esq.  
SEPTENTS DE BRANCHES - H. J. LEWIS, Esq., and C. SHERING, Esq.  
CHIEF ACCOUNTANT - JAMES GRAY, Esq.  
SECRETARY - F. CLAPPISON, Esq.  
HEAD OFFICE - 21, LOMBARD STREET.  
MANAGER - WHITBREAD THOMSON, Esq.  
ASSISTANT MANAGER - WILLIAM HOWARD, Esq.

At the ANNUAL GENERAL MEETING of the proprietors, held on THURSDAY, the 1st February, 1872, at the City Terminus Hotel, Cannon-street Station, following REPORT for the half-year ending the 31st December, 1871, was read by the Secretary.

WILLIAM CHAMPION JONES, Esq., in the chair.

The Directors, in submitting to the proprietors the balance-sheet of the bank for the half-year ending the 31st December last, have the satisfaction to report that after paying interest to customers and all charges, allowing for rebate of making provision for bad and doubtful debts, the net profits amount to £3,000, £. 10d. This sum, added to £449 17s. 4d. brought from the last account, produces a total of £102,548 3s. 3d.

The usual dividend of 6 per cent. for the half-year is recommended, together with a bonus of 3½ per cent., both free of income tax, which will absorb £95,000 leaving £7,548 3s. 3d. to be carried forward to profit and loss new account. The previous dividend and bonus added to the June payment will make 18½ per cent. for the year 1871.

The directors have to announce the retirement of their esteemed colleague, Alfred Harvey, in consequence of his acceptance of the office of Receiver-general of Island Revenue. Abraham Hodgson Phillipps, Esq., has been elected Director in his stead, in accordance with the provisions of the Deed of Settlement.

The directors retiring by rotation are: - Philip Patton Blyth, Esq.; James Morley, Esq., and Abraham Lloyd on Phillipps, Esq., who, being eligible, offer themselves for re-election.

The dividend and bonus, together £1 18s. per share, free of income tax, will payable at the head office at any of the branches on or after Monday, the 1st.

BALANCE-SHEET OF THE LONDON AND COUNTY BANKING COMPANY,

31ST DECEMBER, 1871.

-Capital paid up	£ 1,000,000 0 0
Reserve fund	500,000 0 0
Amount due by the bank for customers' balances, &c.	£16,116,720 5 9
Liabilities on acceptances, covered by securities	2,778,016 6 7 - 18,891,746 12 4
Profit and loss balance brought from last account	4,449 17 4
Gross profit for the half-year, after making provision for bad and doubtful debts, viz.	283,231 19 10 - 287,681 17 2
Total	£20,682,428 9 6

-Cash on hand at head office and branches, and with Bank of England	£ 2,941,062 6 8
Cash placed at call and at notice, covered by securities	2,807,571 10 8 - £ 5,048,633 17 4
Investments, viz.:	
Government and other stocks	1,379,989 9 3
Other stocks and securities	124,945 0 4 - 1,504,834 9 7
Discounted bills, and advances to customers in town and country	10,911,853 5 6
Liabilities of customers for drafts accepted by the bank (as per contra)	2,778,016 6 7 - 18,719,809 12 1
Frechold premises in Lombard-street and Nicholas-lane, freehold and leasehold property at the branches, with fixtures and fittings	248,517 17 4
Interest paid to customers	52,647 9 1
Salaries and all other expenses at head office and branches, including income tax on profits and salaries	107,925 4 1
Total	£20,682,428 9 6

-PROFIT AND LOSS ACCOUNT.	
-Interest paid to customers, as above	£ 52,647 9 1
Expenses, as above	107,925 4 1
Rebate on bills not due, carried to new account	24,561 0 9
Dividend of 6 per cent. for half-year	60,000 0 0
Bonus of 3½ per cent.	35,000 0 0
Balance carried forward	7,548 3 3
Total	£285,681 17 2

-Balance brought forward from last account	£ 4,449 17 4
Gross profit for the half-year, after making provision for bad and doubtful debts	283,231 19 10
Total	£287,681 17 2

We, the undersigned, have examined the foregoing balance-sheet, and have found the same to be correct.

Signed,

WM. JARDINE,  
WILLIAM NORMAN,  
RICHARD H. SWAIN, Auditors.

London and County Bank, 28th January, 1872.

The foregoing report having been read by the secretary, the following resolutions were proposed and unanimously adopted: -

That the report be received and adopted, and printed for the use of the shareholders.

That a dividend of 6 per cent., together with a bonus of 3½ per cent., both free of income tax, be declared for the half-year ending the 31st December, 1871, payable on and after Monday the 12th Inst., and that the balance of £7548 3s. 3d. be carried forward to profit and loss new account.

That Philip Patton Blyth, James Morley, and Abraham Hodgson Phillips, Esquires, be re-elected directors of this company.

That the thanks of this meeting be given to the board of directors for the manner in which they have conducted the affairs of the company.

That William Jardine, William Norman, and Richard H. Swaine, Esquires, be elected auditors for the current year, and that the thanks of this meeting be presented to them for their services during the past year.

That the thanks of this meeting be presented to the general manager, and all the other officers of the bank, for the zeal and ability with which they have discharged their respective duties.

(Signed) W. CHAMPION JONES, Chairman.

The Chairman having quitted the chair, it was resolved, and carried unanimously, that the thanks of this meeting be presented to William Champion Jones, Esq., for his able and courteous conduct in the chair.

(Signed) WILLIAM NICOL, Deputy-Chairman.

Extracted from the Minutes.

(Signed) F. CLAPPISON, Secretary.

ONONDON AND COUNTY BANKING COMPANY.

A notice is hereby given, that a DIVIDEND on the Capital of the Company, at the rate of SIX PER CENT., for the HALF-YEAR ending 31st December, 1871, and a BONUS of THREE AND A-HALF PER CENT., will be paid to the Proprietors, either at the Head Office, 21, Lombard-street, or at any of the Company's branch Banks, on or after MONDAY, the 12th instant.

By order of the Board,

W. MCKEAN, General Manager.

GENERAL MINING OFFICES, BEDFORD FOUNDRY, TAVISTOCK, CONDUCTED BY MR. CHARLES F. COLLOM, MINING ENGINEER, AGENT, AND SURVEYOR.

He undertakes the entire local Management of Mines, including Dialling, making accurate Underground Communications and Plans, at a stipulated salary.

Mines Inspected and faithfully Reported on, orders for which purpose should be made for Mr. Colom, or his Agent.

Promoters of New Mining Enterprises (which will bear the strictest scrutiny) advised every assistance.

Investments in Mines arranged for Capitalists, - the condition of the mines, as well as the prospects of the Mines, being first strictly investigated.

MESSRS. CAMERON AND CO., SHAREBROKERS, CHESTER, having a thorough knowledge of the Lead Mining Districts of Wales, are ENABLED to FURNISH THE BEST and MOST RELIABLE INFORMATION on all WELSH LEAD MINES.

Messrs. CAMERON and Co, have FOR SALE, at £1 each, some fully paid shares (share warrants to bearer) in a very valuable progressive LEAD MINE, which they recommend to investors for immediate purchase. The geological position of the mine is all that can be desired, being situated in one of the most profitable lead mines in Wales. Early application is advised, as there is little doubt it will prove a highly profitable investment.

OFFICES: BRIDGE STREET CHAMBERS, CHESTER.

CAPTAIN ABSALOM FRANCIS, GOGINAN, ABERYSTWITH, MINING AGENT, ENGINEER, AND SURVEYOR.

The great success which is attending the opening and working of the mines of Cardigan and Montgomery, and the many properties placed under the disposal of Capt. ABSALOM FRANCIS, induces him to offer his services to ADVISE, INSPECT, REPORT, OR SURVEY, for Mining Companies private shareholders.

In cases, apply to Capt. ABSALOM FRANCIS, as above.

In the Court of the Vice-Warden of the Stannaries.  
Stannaries of Cornwall.

IN the MATTER of the COMPANIES ACT, 1862, and of the BRYNN COMPANY (LIMITED). - Notice is hereby given, that a PETITION for the WINDING-UP of the ABOVE-NAMED COMPANY by the Court was, on the 27th day of January last, presented to the Vice-Warden of the Stannaries by William Stephens, Joshua Trythway, Samuel Hammer, Charles Jolly, Andrew Arthur, Joseph Dyer, George Vivian, William Nichols, James Harris, Heber Curtis, Francis Cornells, John Osborne, William Hammer, and Daniel Moss, all of the parish of Roche, within the said Stannaries, working miners, and Henry Roberts, of St. Columb, within the said Stannaries, working miners, creditors of the said company, and that the said Petition is directed to be heard before the Vice-Warden, at the Prince's Hall, Truro, in the county of Cornwall, on Monday, the 12th day of February instant, at Twelve o'clock noon.

Any contributory or creditor of the company may appear at the hearing and oppose the same, provided he has given at least two clear days' notice to the petitioners, their solicitors, or agents, of his intention to do so, such notice to be forthwith forwarded to P. P. Smith, Esq., Secretary of the Vice-Warden, Truro.

Every such contributory or creditor is entitled to a copy of the petition and affidavit verifying the same from the petitioners, their solicitors, or agents, within 24 hours after requiring the same, on payment of the regulated charge per folio.

Affidavits intended to be used at the hearing, in opposition to the petition, must be filed at the Registrar's Office, Truro, on or before the 8th day of February instant, and notice thereof must at the same time be given to the petitioners, their solicitors, or their agents.

HODGE, HOCKIN, AND MARRACK, Truro, Cornwall (Solicitors for the Petitioners).

GREGORY, ROWCLIFFE, AND RAWLE, 1, Bedford-row, London (Agents of the said Solicitors).

Dated Truro, February 1st, 1872.

In the Court of the Vice-Warden of the Stannaries.  
Stannaries of Cornwall.

IN the MATTER of the COMPANIES ACT, 1862, and of the GREAT ROYALTON MINING COMPANY. - Notice is hereby given, that a PETITION for the WINDING-UP of the ABOVE-NAMED COMPANY by the Court was, on the 26th day of January last, presented to the Vice-Warden of the Stannaries by Nicholas Grose, of Roche, within the said Stannaries, a creditor of the said company, and that the said Petition is directed to be heard before the Vice-Warden, at the Prince's Hall, Truro, in the county of Cornwall, on Monday, the 12th day of February instant, at Twelve o'clock noon.

Any contributory or creditor of the company may appear at the hearing and oppose the same, provided he has given at least two clear days' notice to the petitioners, their solicitors, or agents, of his intention to do so, such notice to be forthwith forwarded to P. P. Smith, Esq., Secretary of the Vice-Warden, Truro.

Every such contributory or creditor is entitled to a copy of the petition and affidavit verifying the same from the petitioners, his solicitor, or his agents within 24 hours after requiring the same, on payment of the regulated charge per folio.

Affidavits intended to be used at the hearing, in opposition to the petition, must be filed at the Registrar's Office, Truro, on or before the 8th day of February instant, and notice thereof must at the same time be given to the petitioners, his solicitor, or his agents.

HODGE, HOCKIN, AND MARRACK, Truro, Cornwall (Solicitors for the Petitioners).

GREGORY, ROWCLIFFE, AND RAWLE, 1, Bedford-row, London (Agents of the said Solicitors).

Dated Truro, February 1st, 1872.

In the Court of the Vice-Warden of the Stannaries.  
Stannaries of Cornwall.

IN the MATTER of the COMPANIES ACT, 1862, and of the HARMONY AND MONTAGUE TIN AND COPPER MINING COMPANY (LIMITED). - TENDERS will be RECEIVED at the Registrar's Office, Truro, until Friday, the 9th day of February instant, stating the highest price which will be given for the following

## MINING MACHINERY, viz.:-

ONE SUPERIOR 40-in. double-acting rotary ENGINE, with fly-wheel and driving-gear, complete.

ONE BOILER, about 13 tons, with fittings.

12-in. head-stamps axle; 7 1/2-in. pumps; 3 matching-pieces; 1 13-in. plunger-pole; 1 centre-piece for angle-bob; iron-work for balance-bob, consisting of gudgeon, nose-piece, bishop's-head, 4 bridles, and 3 plumber-blocks; 1 sword for first piece of rods; 4 strapping-plates; bolts, &c.

Also, the following MACHINERY below surface, viz.: H-piece, top door-piece, wind-bore, plunger-case, and pump.

The above ENGINE and MATERIALS are well worthy the attention of mining agents and others interested in mining, and are now on the TREVENEN MINE, in the parish of WENDRON, CORNWALL, the same having been recently purchased by the Harmony and Montague Tin and Copper Mining Company (Limited).

For leave to inspect, and also for all further information, application should be made to - HODGE, HOCKIN, AND MARRACK, Solicitors, Truro.

Dated Truro, February 1, 1872.

## NORTH DOWNS MINE, near REDRUTH, CORNWALL.

JOHN THOMAS, of the Glebe, Redruth, has been favoured with instructions to SELL, in ONE LOT, BY PUBLIC AUCTION, the following

## MACHINERY AND MATERIALS.

Now standing at NORTH DOWNS MINE, near the Redruth and Scorrier Railways Stations, on the West Cornwall Railway, on Tuesday, February 13th, 1872, at the account house of the above Mine, at One o'clock precisely:-

ONE 60 in. cylinder PUMPING ENGINE, with TWO BOILERS and fittings, and first piece of main rod; capstan and shears; balance bob; capstan rope; main rods; shaft; tackles; pump and bottoms, complete, from 15 in. to 7 in. railway iron; steam whim; with boiler; fly wheel and cage, complete; crusher; with railroad, complete; dry tube; wood shod; smiths' and miners' tools; horse whim; account house furniture; and a large variety of articles in use on the mine.

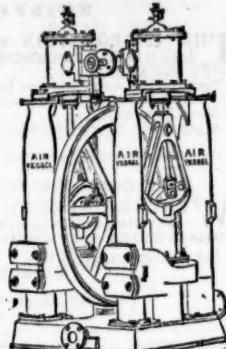
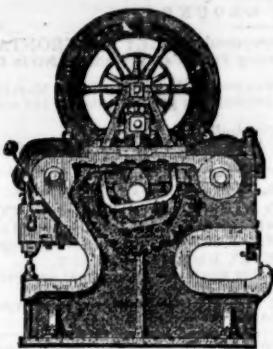
If not sold in ONE LOT, the above will be offered piecemeal; and for conditions of sale, applications to be made to Messrs. WARD and LITTLEWOOD, Crosby-hill, Bishopsgate-street, Within, London, E.C.; to Mr. THOMAS PRYOR, Redruth; or to Mr. JOHN THOMAS, of the Glebe, Redruth.

FOR SALE, BY PRIVATE CONTRACT, ONE OF THE BEST MINING PROPERTIES IN IRELAND.

TO BE SOLD, BY PRIVATE CONTRACT, all the COAL lying in or under land comprising 1188 acres 1 rood 18 perches, or thereabouts, situate in the QUEEN'S COUNTY, in IRELAND, in the centre of the Leinster Coal District. The coal is anthracite, and there is a ready demand for it at the pit's mouth, at which the prices are from 15s. to 20s. per ton for coal, and from £s. to £s. 6d. per ton for slate in the crom of the Upper or Old Three-feet Seam, and a small portion of the next underlying bed, or Griffith's Four-feet Seam, which have been worked in connection with an adjoining colliery on the north of this property. The same Four-feet Seam is at present being worked in another colliery to the south of this, and bounding it, with a dip to the north and northeast. The underlying seam has not been sunk to. The crop can be seen on the adjoining collieries, where they are in process of being worked. There is a great facility for an adit level, which would uncover a large portion of the property for a very small outlay. Rights of winning, working, and carrying away the coal have been hitherto exercised by the owner will be granted.

The property is held under a Landed Estates Court Title. Every facility will be given for personal survey and inspection of the property, which is well worthy the attention of capitalists, and further information can be obtained on application to B. B. Engle, Esq., Glonbrook, near Carlisle, Ireland; or to JOHN EDGE, Esq., 2, Elm-court, Temple, E.C.

## RARE OPPORTUNITY FOR MAKING A

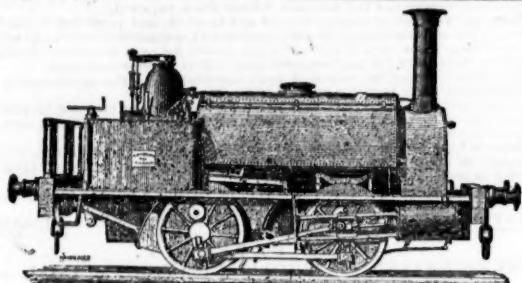


JOHN CAMERON,

MAKER OF

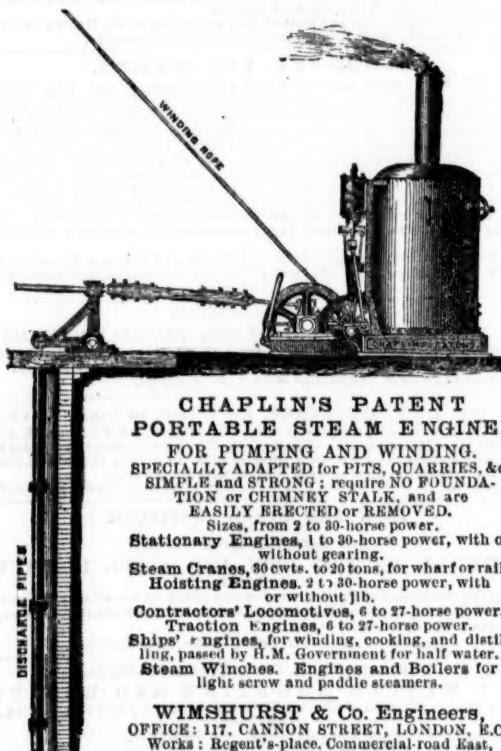
STEAM PUMPS, PORTABLE ENGINES, PLATE BENDING ROLLERS  
BAR AND ANGLE IRON SHEARS, PUNCHING AND SHEARING  
MACHINES, PATENTEE OF THE DOUBLE CAM LEVER  
PUNCHING MACHINE, BAR SHEARS, AND RAIL  
PUNCHING MACHINES,

EGERTON STREET IRON WORKS,  
HULME, MANCHESTER.



TANK LOCOMOTIVES,  
FOR SALE OR HIRE.  
HENRY HUGHES AND CO,  
LOUGHBOROUGH.

Prize Medal—International Exhibition, 1862.



CHAPLIN'S PATENT  
PORTABLE STEAM ENGINE  
FOR PUMPING AND WINDING.  
SPECIALY ADAPTED FOR PITS, QUARRIES, &  
SIMPLE AND STRONG; REQUIRES NO FOUNDA-  
TION OR CHIMNEY STALK, and are  
EASILY ERECTED or REMOVED.  
Sizes, from 2 to 30-horse power.  
Stationary Engines, 2 to 30-horse power, with or  
without gearing.  
Steam Cranes, 20 cwt., to 20 tons, for wharf or rail.  
Hoisting Engines, 2 to 30-horse power, with or  
without jib.  
Contractors' Locomotives, 6 to 27-horse power.  
Traction Engines, 6 to 27-horse power.  
Ships' engines, for winding, cooking, and distil-  
ling, passed by H.M. Government for half water.  
Steam Winches. Engines and Boilers for  
light screw and paddle steamers.

WIMSHURST & CO. Engineers,  
OFFICE: 117, CANNON STREET, LONDON, E.C.  
Works: Regent's-place, Commercial-road East,  
London, E.

THOMAS TURTON AND SONS,  
MANUFACTURERS OF  
CAST STEEL for PUNCHES, TAPS, and DIES,  
TURNING TOOLS, CHISELS, &c.

CAST STEEL PISTON HOLES, CRANE PINS, CON-  
NECTING RODS, STRAIGHT and CRANK  
AXLES, SHAFTS and  
FORGINGS of EVERY DESCRIPTION

DOUBLE SHEAR STEEL | FILES MARKED  
BLISTER STEEL, | EDGES TOOLS MARKED  
SPRING STEEL, | WM. GREAVES & SON  
GERMAN STEEL.

Locomotive Engine, Railway Carriage and Wagon  
Springs and Buffers.

SHEAF WORKS AND SPRING WORKS, SHEFFIELD.  
LONDON WAREHOUSE, 35, QUEEN STREET, CANNON STREET, CITY, E.C.  
Where the largest stock of steel, files, tools, &c., may be selected from.

W. GÜNTHER,  
CENTRAL ENGINEERING WORKS OLDHAM,  
MANUFACTURER OF MOST IMPROVED  
Silent Fans for blowing and exhausting.

" " and Steam Engines com-  
bined, for ventilation.

Direct-acting Steam Fans.  
Centrifugal Pumps and Pumping En-  
gines.

Turbine Water Wheels, for high and  
low falls, and variable quantities of  
water.

Cast-iron Smiths' Hearths.  
General Engineering Work.

ILLUSTRATED PRICE LISTS AND REFER-  
ENCES ON APPLICATION.

THE IRON AND COAL TRADES' REVIEW:  
ROYAL EXCHANGE, MIDDLESBROUGH.  
The IRON AND COAL TRADES' REVIEW is extensively circulated amongst the  
Iron Producers, Manufacturers, and Consumers, Coalowners, &c., in all the iron  
and coal districts. It is, therefore, one of the leading organs for advertising  
every description of Iron Manufactures, Machinery, New Inventions, and all  
matters relating to the Iron, Coal, Hardware, Engineering, and Metal Trades  
in general.

Offices of the Review:—Middlesbrough-on-Tees (Royal Exchange); London  
11 and 12, Red Lion-court, Fleet-street; Newcastle-on-Tyne (40, Grey-street).



BLAST-FURNACE & SUPERIOR PUDDLING ORE.  
THE DALTON HEMATITE MINING COMPANY,  
ULVERSTON,  
Are in a position to SUPPLY BLAST-FURNACE and very SUPERIOR PU-  
DDLING ORE to consumers only.

PISTONS, AND AIR-PUMP BUCKETS,  
FITTED WITH

PATENT ELASTIC METALLIC PACKING.  
Of which above FIVE THOUSAND EIGHT HUNDRED have been made by

MESSRS. MATHER AND PLATT,  
SALFORD IRONWORKS, MANCHESTER

MARTIN'S PATENT PISTON.  
CONTINUOUSLY STEAM-TIGHT; EFFECTING GREAT SAVING IN  
FUEL; GIVING ADDITIONAL POWER; AND NO TROUBLE.

Address,—  
MILLBROOK FOUNDRY, SWANSEA.

MECHANICAL VENTILATORS FOR MINES.  
MESSRS. BLACK, HAWTHORN, AND CO.,  
LOCOMOTIVE, MARINE, AND STATIONARY ENGINE WORKS,  
GATESHEAD-ON-TYNE,

HAVE now a speciality for the construction of the "GUIBAL"  
FAN, with their Engines designed expressly for them. Tenders sent  
on application.

#### ORE-DRESSING MACHINERY.

SEPARATION TROMMELS.—Cylindrical, double cylindrical,  
conical, double conical, and cascade trommels.

JIGGING MACHINES.—Continuous, for coarse and fine sand.

CLASSIFIERS.—For fine sand and slimes.

SHAKING TABLES.—End and side blow.

BUDDLES.—Concave, convex, and continuous.

PERFORATED PLATES.—For Trommels, Jigging Sieves, and

Stamp Grates.

For particulars, apply to—  
MESSRS. KEMBER AND CO.,

CLARENCE GROVE, DRUMMOND STREET, N.W., LONDON

#### CRUSHER ROLLS.

THE SANDYCROFT FOUNDRY AND ENGINE WORKS  
COMPANY (LIMITED),

Are now MANUFACTURING CRUSHER ROLLS of PECCULARLY HARD  
and TOUGH METAL, and are OPEN to UNDERTAKE the SUPPLY of ANY  
QUANTITY, and to any PATTERN REQUIRED.

Prices and particulars of the above, and of every description of Mining Eng-  
ines, Rollers, Forgings, Pitwork, Water Wheels, Crushing, Dressing, and Amal-  
gamating Machinery, and Mining Tools of all kinds, &c., &c., may be obtained  
on application at the works of the company,

SANDYCROFT, near CHESTER; or at their London Office,

MESSRS. JOHN TAYLOR AND SONS, 6, QUEEN STREET PLACE, E.C.

BENNETT'S SAFETY FUSE WORKS,  
ROSKEAR, CAMBORNE, CORNWALL.

#### BLASTING FUSE FOR MINING AND ENGINEERING PURPOSES.

Suitable for wet or dry ground, and effective in Tropical or Polar Climates.

W. BENNETT'S, having had many years' experience as chief engineer with  
MESSRS. BICKFORD, SMITH, and CO., is now enabled to offer Fuse of every variety  
of his own manufacture of best quality, and at moderate prices.

Price Lists and Sample Cards may be had on application at the above address.

Dated December 22, 1871.

#### IMPORTANT ANNOUNCEMENT.

#### RE-OPENING OF THE TAVISTOCK ROPE-WALK.

HENRY MAY (from the Teat's Hill Ropery, Plymouth) begs  
to inform the Proprietors, Mine Agents, Purasers, and Managers of the  
various Mines in the Tavistock and Cornwall Districts that he has OPENED  
the above MINING ROPE WORKS, and hopes by strict personal attention to  
business, and supplying goods of the best quality at the lowest remunerative  
prices, to be favoured with their patronage and support.

Dated December 22, 1871.

JOHN HORSLEY  
IRON AND METAL AGENT,  
ST. ANN'S SQUARE, MANCHESTER.

PERMANENT, CONTRACTORS, and COLLIERY RAILS, in STEEL or IRON  
Wrought-Iron or Steel Weldless Locomotive Carriages and Wagon Tyres,  
Iron and Steel Straight and Cranked Axles, Wheels and Axles, Railway Chair  
Fish Plates, Bolts and Nuts, Spikes, Cranes, Jacks, Rivets, Hurdles,  
and Chains.

Black or Galvanised Telegraph Wires, Fencing Wire.

BLACK, OILED, and GALVANISED CORRUGATED SHEETS.

Rolled Iron Joints, Wrought-Iron Girders, Roofs, Bridges, Tanks, Boilers, &c.

Boat Girder, Tank Bridge and Boiler Plates.

Angle, Tee, and Girder Iron.—Nail Rods, Tin Plates, Hoops, Sheets, Lead, Cop  
per, Tin, Zinc, and Spelter.

Hot and Cold Blast Pig Iron, &c., &c.

EMPORIUM FOR MANUFACTURED ARTICLES OF NEARLY  
EVERY DESCRIPTION.

No. 82, LOWE'S MARSH, LAMBETH.

W. MARCHANT,  
WHOLESALE AND RETAIL

DEALER IN GLASS, CHINA, EARTHENWARE, IRONMONGERY, TIN  
GOODS, BRUSHES AND BROOMS, CHINA FIGURES AND ORNAMENTS,  
MUSICAL INSTRUMENTS, CUTLERY, METAL GOODS, JAPANNED  
GOODS, AMERICAN PAIRS, and IMPORTER OF FOREIGN  
GLASS,  
GOODS LENT ON HIRE.

JOHN AND EDWIN WRIGHT  
PATENTEES.  
(ESTABLISHED 1770.)

MANUFACTURERS OF EVERY DESCRIPTION OF  
IMPROVED

#### PATENT FLAT AND ROUND WIRE ROPES.

From the very best quality of charcoal iron and steel wire.

PATENT FLAT AND ROUND HEMP ROPES.

SHIP'S RIGGING SIGNAL AND FENCING STRAND, LIGHTNING CON-  
DUCTORS STEAM PLOUGH ROPES (made from Webster and Horstall)  
patent steel wire), HEMP, FLAX, ENGINE IRON, COTTON WASTE,  
TARPAULING, OIL SHEETS, &c., &c.

UNIVERSAL WORKS, MILLWALL, POPLAR, LONDON,  
UNIVERSE WORKS, GARRISON STREET, BIRMINGHAM,  
CITY OFFICE, 10, LEADENHALL STREET, LONDON, E.C.

F. G. MULHOLLAND'S  
PATENT PHOSPHORISED PRESERVATIVE  
AND  
ELASTIC ENAMEL COMPOSITIONS

FOR PREVENTING FOULING ON SHIPS' BOTTOMS  
and PRESERVATIVELY COATING EXTERNAL or INTERNAL TIM-  
BER and METALLIC CONSTRUCTION or every kind.

These invaluable mediums are supplied in a liquid state, of any required tint,  
ready for use in all climates. They set almost immediately without smell; cost  
less than ordinary colour; their application does not require skilled labour;  
two coats produce an effective stain and varnish; they afford absolute protec-  
tion to timber from dry rot; and being proof against humidity are specially  
adapted as glue for joiners' and cabinet-makers' work generally.

Particulars and prices of the proprietors—

21, GREAT ST. HELENS, BISHOPS-GATE, E.C., LONDON.

MACHINE-ORNAMENTED GLASS, METAL, WOOD, &c.

EDWARD LEE AND CO.,

INVENTORS and SOLE PROPRIETORS of the PROCESS for ORNAMENT-  
ING in GOLD and COLOURS on all surfaces, shapes, and sizes. It is superior  
to, and in many cases impossible to do by, skilled and artistic hand labour.  
The process is peculiarly adapted for super-diamond glass writing in all its pur-  
poses, by its superiority, cheapness, and durability.

WALL TILES AND DECORATIONS, FACIAS, SIGN BOARDS,  
SHOW TABLETS, &c.

WORKS: 10, FEATHERSTONE BUILDINGS, HOLBORN, W.C.;  
And 23, SOUTH CASTLE STREET, LIVERPOOL.

#### BICKFORD'S PATENT FOR CONVEYING

#### CHARGE IN

Obtained the PRIZE MEDALS at the "ROYAL EXHIBITION"  
the "INTERNATIONAL EXHIBITION" of 1862, in London;  
"PERIAL EXPOSITION" held in Paris, in 1863; at the "INTER-  
EXHIBITION," in Dublin, 1865; at the "UNIVERSAL EXHIBITION,"  
Paris, 1867; and at the "GREAT INDUSTRIAL EXHIBITION,"  
in 1869.

BICKFORD, SMITH AND CO., TUCKINGMILL, CORNWALL,  
TURERS of PATENT SAFETY-FUSE, have formed that the name of their firm has  
not of their manufacture, beg to call the trade and public to the following arms:  
Every COIL of FUSE MANUFACTURED  
has TWO SEPARATE THREADS PASSING THROUGH THE  
GUNPOWDER, and BICKFORD, SMITH AND CO. CLAIM SUCH  
SEPARATE THREADS AS THEIR TRADE MARK.

For Excellence  
and Practical Success  
of Engines

REPRESENTATIVE  
Model exhibition  
this year

HARVEY AND CO.,  
ENGINEERS AND GENERAL MERCHANDISE

HAYLE, CORNWALL,  
AND HAYLE FOUNDRY WHARF, NINE ELMS, LONDON,  
CITY OFFICES (GRESHAM HOUSE), 23½, OLD BROAD

PUMPING and other LAND ENGINES and MARINE STEAM  
the largest kind in use, SUGAR MACHINERY, MILLWORK,  
MACHINERY, and MACHINERY IN GENERAL,  
SHIPBUILDERS IN WOOD AND IRON.

SECONDHAND MINING MACHINERY FOR  
IN FIRST-RATE CONDITION, AT MODERATE PRICES,  
PUMPING ENGINES; WINDING ENGINES; STAMPING  
STEAM CAPSTANS; and CRUSHERS of various sizes,  
PITWORK of all descriptions, and all kinds of MATERIAL  
for MINING PURPOSES.

THE PATENT PNEUMATIC STAMP  
May be SEEN AT WORK at HAYLE FOUNDRY WHARF, NINE  
by previous application at either of the above addresses

RAILWAY CARRIAGE COMPANY LTD  
ESTABLISHED 1847.  
OLDBURY WORKS, NEAR BIRMINGHAM,  
MANUFACTURERS OF RAILWAY CARRIAGES AND WAGONS,  
DESCRIPTION OF IRONWORK.

Passenger carriages and wagons built, either for cash or  
over a period of years.

RAILWAY WAGONS FOR HIRE.  
CHIEF OFFICES, OLDBURY WORKS, NEAR BIRMINGHAM,  
LONDON OFFICES, 7, GREAT WINCHESTER STREET, BIRMINGHAM.

THE BIRMINGHAM WAGON COMPANY LTD  
MANUFACTURE RAILWAY WAGONS OF EVERY DESCRIPTION  
HIRE and SALE, by immediate or deferred payments. They  
are hireable of carrying 6, 8, and 10 tons, part of which are  
especially for shipping purposes. Wagons in working order maintained  
BY EDMUND POWELL

WAGON WORKS, SMETHWICK, BIRMINGHAM.  
Loans received on Debenture; particulars on application

STAFFORDSHIRE WHEEL AND AXLE CO  
(LIMITED).  
MANUFACTURERS OF RAILWAY CARRIAGE, WAGON, and  
CARRIAGE WHEELS and AXLES, and other IRONWORK used in  
CONSTRUCTION OF RAILWAY ROLLING STOCK.

OFFICES AND WORKS,  
HEATH STREET SOUTH, SPRING HILL, BIRMINGHAM.

THE PATENT SELF-ACTING MINERAL DRESSING  
MACHINE COMPANY (LIMITED).

T. CURRIE GREGORY, MINING ENGINEER,  
OFFICES, 62, ST. VINCENT STREET, GLASGOW.

This company grants Licenses, under their patents, for the use  
combination, of the most approved machinery for dressing coal,  
Stamps, Jiggers, Side-blown Percussion Tables, Classifiers, and Ball  
The whole in combination are in successful operation at Rhaeadr  
Machynlleth, and the Bog Waste, Shropshire.

The Jiggers are largely used at the Van, Caldebeck Colliery, and  
mines, with unequalled success.

Self-acting Floors are in course of construction at various Mines  
and Scotland, regarding which Mr. GREGORY will be pleased to give  
information, answer all enquiries, and give orders for inspection.

He is prepared to give designs and estimates for the supply of

and for the laying out of Floors.

LICENSED MAKERS FOR GREAT BRITAIN.

Messrs. WILLIAMS, Perran Foundry Company, Cornwall, in  
west of Truro.

Messrs. WILLIAM WEST AND SONS, St. Blazey, for Corn-  
wall, Truro, to Callington.

Messrs. NICHOLLS, MATTHEWS, AND CO., Tavistock, in  
east of Callington, and for Devon.

Mr. GEORGE GREEN, Engineer, Aberystwyth, for the shire of  
Carmarthen, Cardigan, Radnor, Merioneth, Caernarvon, Den-  
bigh, Flint, Denbigh, and Anglesea.

Messrs. EASTON AND TATTERSALL, Leeds, for part of No-  
ttinghamshire south of Ripon.

## J. WOOD ASTON AND CO., STOURBRIDGE

(LATE WOOD BROTHERS).

(WORKS AND OFFICES ADJOINING CRADLEY STATION),

Manufacturers of

### CRANE, INCLINE, AND PIT CHAINS,

ALSO CHAIN CABLES, ANCHORS, and RIGGING CHAINS, IRON and STEEL SHOVELS, SPADES and FORKS, ANVILS, VICES, SCYTHES, HAY and CHAFF KNIVES, PICKS, HAMMERS, NAILS, RAILWAY and MINING TOOLS, FRYING PANS, BOWLS, LADLES, &c., &c.

Crab Winches, Pulley and Snatch Blocks, Screw and Lifting Jacks, Ship Knees, Forgings, and Use Iron of all descriptions.

STOURBRIDGE FIRE BRICKS AND CLAY.

AWARDED TWENTY GOLD AND SILVER FIRST-CLASS PRIZE MEDALS.

IMMENSE SAVING OF LABOUR

TO MINERS, IRONMASTERS, MANUFACTURING CHEMISTS, RAILWAY COMPANIES, EMERY AND FLINT GRINDERS, MCADAM ROAD MAKERS, &amp;c., &amp;c.

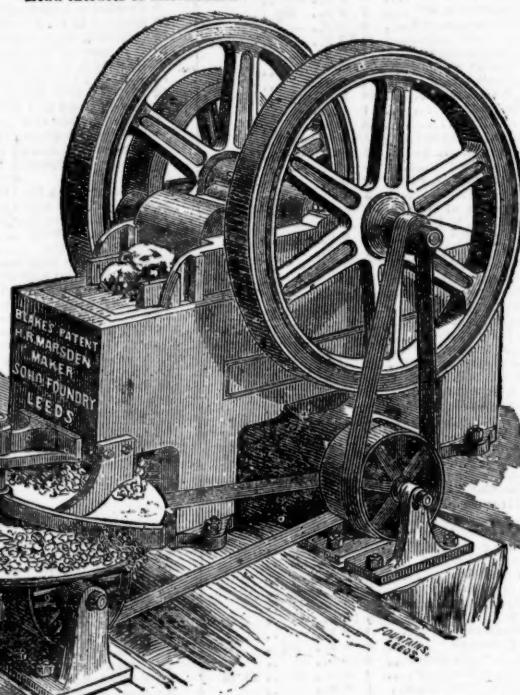
## BLAKE'S PATENT STONE BREAKER, OR ORE-CRUSHING MACHINE,

FOR REDUCING TO SMALL FRAGMENTS ROCKS, ORES, AND MINERALS OF  
EVERY KIND.

This is the only machine that has proved a success. This machine was shown in full operation at the Royal Agricultural Society's Show at Manchester, and at the Highland Agricultural Society's Show at Edinburgh, where it broke 1½ ton of the hardest trap or whinstone in eight minutes, and was AWARDED TWO FIRST-CLASS SILVER MEDALS. It has also just received a SPECIAL GOLD MEDAL at Santiago, Chili.

is rapidly making its way to all parts of the globe, being now in profitable use in California, Washoe, Lake Superior, Australia, Cuba, Chili, Brazil, and throughout the United States and England.

Read extracts of testimonials:-



For Illustrated catalogue, circulars, and testimonials, apply to—

## H. R. MARSDEN, SOHO FOUNDRY, MEADOW LANE, LEEDS, ONLY MAKER IN THE UNITED KINGDOM.

## THE DON ECONOMIC LUBRICATING OIL IS 40 PER CENT. CHEAPER THAN THE ORDINARY KINDS.

MR. ALFRED HEWLETT, of the Wigan Coal and Iron Company, says:—"I have used it for two years, and find it to answer exceedingly well for lubricating purposes."

MR. NASMYTH, the Inventor of the Steam-Hammer, says:—"I am highly pleased with it as a most effective and durable lubricant, having remarkable properties in the way of setting free bearings which had got set fast."

In fact of these and hundreds of other letters to the same effect, it is a MERE WASTE OF MONEY to use the dearer kinds for the engines and machinery of collieries and mines, numbers of which are now using the Don Oil instead.

Any company desirous of trying it before adopting it may do so at our risk and expense.

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PRICE—By the Ton of 253 Gallons, 2s. 6d. a gallon; by the Cask of 40 Gallons, 2s. 9d.

AGENTS WANTED AT HOME AND ABROAD.

## DUNCAN BROTHERS, MANAGERS, DON OIL COMPANY, 2, BLOMFIELD STREET, LONDON, E.C.

BY APPOINTMENT TO HER MOST



GRACIOUS MAJESTY THE QUEEN.

FEARFUL

## BILLY EXPLOSIONS AVOIDED BY USING PAYNE'S ANTI-CORROSION FLUID.

It is highly recommended by Engineers to Proprietors of Steam Boilers (Marine or Stationary) for PREVENTION and REMOVAL of INCURSTATION. The price is 6s. per gallon. One gill per horse power per week will remove any incrustation from old boilers, and keep new perfect.

[CERTIFICATE.]

"19, Staunton-terrace, Blue Anchor-road, S.E., March 12, 1869.

"DEAR SIR.—I have minutely examined your Anti-Corrosive Preparation, and can state with confidence that in no way is it injurious to iron or brass. It is inodorous and perfectly harmless, even when swallowed.

T. R. L. HOOPER, M.R.C.S.L.

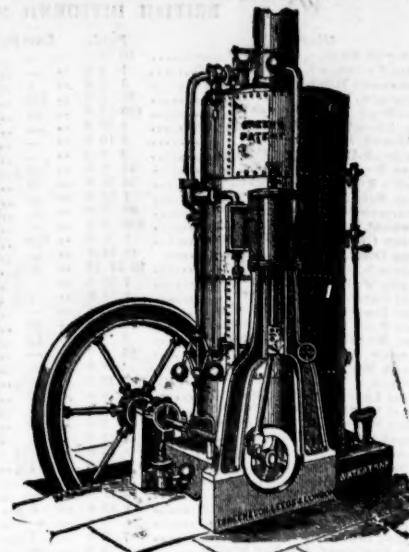
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PAYNE AND CO.,

33, CHERRY GARDEN STREET, BERMONDSEY, LONDON, S.E.

## GREEN'S PATENT BOILERS, WITH INVERTED CYLINDER ENGINE COMBINED

Specially adapted for Contractors, Joiners, and Builders, Cabinet-makers, Brick-makers, Farmers, Mills, Dyehouses, Workshops, Printing-offices, &c.



For Exportation they are forwarded ready for sea, packed in cases, and sent out in

The above Engines and Boilers are constructed in an exceedingly substantial and simple manner, every part being easy of access, consequently can be readily understood and managed; they are fitted with governors, equilibrium throttle valve, stop valve, safety valve, feed pump, water and steam gauges complete. The foundation plate answers the purpose of feed water tank, in which the water is heated before passing into the boiler, and also of an ash-pit, and no brickwork or foundation is required.

N.B.—Upwards of 600 of these Engines and Boilers are now at work, giving entire satisfaction.

Illustrated PRICE LISTS free on application to  
**T H O M A S   G R E E N   A N D   S O N ,**  
SMITHFIELD IRONWORKS, LEEDS;  
And 54 and 55, Blackfriars-road, London, S.E.

## IMPROVED APPLICATION OF WATER POWER.

### THE TURBINE.

Mac Adam, Brothers, &amp; Co.

ENGINEERS,

SOHO FOUNDRY, BELFAST,

After twenty years of experience, have brought their Improved TURBINE to great perfection.

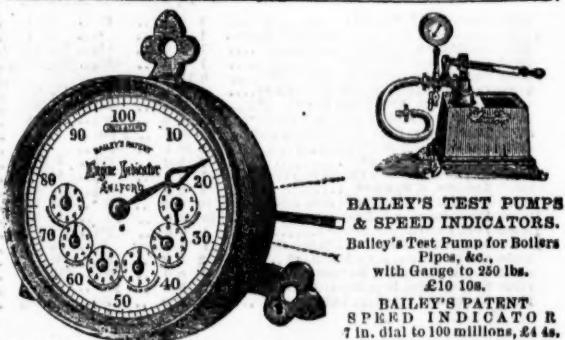
It is applicable to all practicable heights of fall, giving much greater power from the water than any other kind of water-wheel.

On low falls it has the great advantage of not being impeded by floods or back-water.

It is particularly well adapted for situations where the quantity of water is variable, and where all other wheels fail.

Its motion is extremely regular, and, when desired, a Governor can be applied effectively.

This Wheel is at work in a great many places, to which reference will be given.



BAILEY'S TEST PUMPS  
& SPEED INDICATORS.

Bailey's Test Pump for Boilers  
Pipes, &c.,  
with Gauge to 250 lbs.  
£10 10s.

BAILEY'S PATENT  
SPEED INDICATOR  
7 in. dial to 100 millions, £4 4s.

(In order, say if for reciprocating or rotary motion.) Used for Pumping  
Engines, Winding Purposes, &c.

J. BAILEY & CO., STEAM GAUGE MAKERS AND BRASS FOUNDRERS,  
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WATERPROOF.

By a special method of preparation, this leather is made solid, perfectly close in texture, and impermeable to water; it has, therefore, all the qualifications essential for pump buckets, and is the most durable material of which they can be made. It may be had of all dealers in leather, and of

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TANNERS AND CURRIERS, LEATHER MILLBAND AND HOSE PIPE  
MANUFACTURERS,  
LONG LANE, SOUTHWARK, LONDON.

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COUNTIES ADVERTISER. (ESTABLISHED 1764.)  
THE DAILY CHRONICLE AND NORTHERN COUNTIES ADVERTISER  
Offices, 42, Grey-street, Newcastle-upon-Tyne; 50, Howard-street, North  
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Just published, post free for two stamps,  
**W O N D E R F U L   M E D I C A L   D I S C O V E R Y ,**  
Showing the true causes of Nervous, Mental, and Physical Debility, Lowness of Spirits, Indigestion, WANT OF ENERGY, PREMATURE DECLINE, with plain directions for PERFECT RESTORATION TO HEALTH AND VIGOUR IN A FEW DAYS.

The most important fact at these alarming complaints may easily be removed WITHOUT MEDICINE.

is here clearly demonstrated, and the entirely new and highly successful treatment, as adopted by the author, fully explained, by means of which

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N. B.—MEDICINE AND FEES SUPERSEDED.

Reference to the leading Physicians of the day.

\* TEST GRATIS. SEND FOR DETAILS.

## THE MINING SHARE LIST.

## BRITISH DIVIDEND MINES.

Shares.	Mines.	Paid.	Last Pr.	Clos. Pr.	Total divs.	Per share.	Last paid.
1500 Alderley Edge, c. Cheshire*		10 0 0	..	..	1 16 4.	0 6 0.	Jan. 1872
2000 Blaen Cardian, s-l, Cardig.*		3 0 0	..	..	15 15 8.	0 2 0.	0 1 0.
1800 Boscastle Down, t, St. Just		3 0 0	..	4	3% 4%	0 5 8.	0 2 0.
200 Bootlack, t, c, St. Just		2 0 0	..	220 230	603 15 2.	2 1 0.	Nov. 1871
500 Brynford, s-l, Cardigan*		100 0 0	..	95	9 35	110 0 0.	2 0 0.
4000 Brookwood, c, Buckfastleigh		1 16 0	..	..	43 54	1 2 0.	2 0 0.
6400 Cashwell, t, Omberland*		2 10 0	..	..	..	1 0 0.	0 2 0.
5000 Castle-an-Dinas, t, St. Columb.		2 0 0	..	..	..	1 0 0.	0 2 0.
1000 Carr Bras, t, Illogan		35 0 0	..	..	..	1 0 0.	0 2 0.
2450 Cook's Kitchen, c, Illogan*		19 14 9	50	47 49	142 1/2.	137 1/2 142 1/2.	285 10 0.
867 Cwrt Erth, t, Cardiganshire		7 10 0	..	..	31 13 0.	0 5 0.	Jan. 1872
128 Cwmyntswith, t, Cardiganshire		80 0 0	..	..	394 10 0.	2 2 0.	0 0 0.
260 Derwent Mines, t, St. Durham		300 0 0	..	..	177 0	0 2 0.	2 10 0.
1024 Devon G. Consols, c, Tavistock*		1 0 0	..	150	130 140	1150 0 0.	6 0 0.
658 Ding Dong, t, Guivalt		49 14 8	..	..	7 10 0.	0 1 0.	15 0.
4166 Dolcoath, t, Omberland		10 14 10	..	87 1/2.	87 1/2 90	89 14 2.	1 13 4.
12800 Drake Walls, t, Calstock		2 10 0	..	..	1 3 3.	0 1 0.	July 1871
6144 East Caradon, t, St. Cleer		2 11 8	..	5 1/2.	5 1/2 34	14 14 0.	0 2 6.
200 East Darren, t, Cardiganshire		32 0 0	..	..	201 10 0.	1 0 0.	Sept. 1871
6400 East Pool, t, c, Pool, Illogan		9 9 9	23	..	12 6 3.	0 5 0.	Jan. 1872
1906 East Wheal Lovell, t, Wendron		3 9 0	12	..	19 8 6.	0 12 6.	Aug. 1871
2800 Fosdalle, t, Isle of Man*		25 0 0	..	..	79 5 0.	0 15 0.	Oct. 1870
5000 Frank Mills, t, Christow		18 18 6	..	..	4 8 0.	0 2 6.	Aug. 1870
3250 Gawton, c, Tavistock		3 10 8	..	6 1/2.	5 1/2 6	0 8 0.	0 5 0.
1500 Great Laxey, t, Isle of Man*		4 0 0	18	..	14 15	4 15 0.	0 6 0.
3000 Great Northern Manganese*		8 0 0	..	..	..	5 p.c.t.	Feb. 1869
5000 Great Wheal Vor, t, Helston		40 0 0	10	..	5 14 6.	0 2 6.	Dec. 1869
10240 Gunnislake (Clitter), t, c		4 19 0	..	..	0 2 0.	0 1 0.	Nov. 1870
10244 Herodsfoot, t, near Ilkeward		10 10 0	..	37 1/2.	35 37	58 10 0.	1 10 0.
25000 Killaloe, s-l, Tipperary		1 0 0	..	1/4.	1/4 1/4	0 2 11/2.	0 9/4.
165 Levant, t, St. Just		10 8 1	..	..	101 0.	0 2 0.	Aug. 1869
400 Lisburne, t, Cardiganshire		18 15 0	..	..	543 10 0.	2 0 0.	Mar. 1871
5000 Marke Valley, c, Caradon		4 10 6	..	5 1/2.	5 1/2 6	0 8 0.	0 5 0.
9000 Miners' Mining Co., Wrexham		5 0 0	..	..	..	4 15 0.	0 6 0.
20000 Mining Co. of Ireland, c, l.l.*		7 0 0	..	7 1/2.	7 1/2 6	5 14 0.	0 6 0.
6400 New Pembroke, t, c, Penzance		5 0 0	..	..	58 12 8.	0 16 0.	Nov. 1871
12000 North Hendre, t, Wales		2 10 0	..	..	0 4 6.	0 2 6.	July 1870
2000 North Levant, t, c, St. Just		10 12 0	..	16	15 16	3 5 0.	0 15 0.
8810 North Wheal Crofty, c, Illogan		31 11 3	..	13/4.	13/4 13/4	0 8 0.	0 5 0.
8844 Pedenware United, t, Redruth		8 3 0	12	..	10 11	0 5 0.	0 5 0.
256 Pendavon United, t, c, Camb.		25 6	..	21/2.	21/2 4%	21 0.	0 3 0.
8000 Penhalls, t, St. Agnes		3 0 0	..	4 1/2.	4 1/2 4%	2 2 0.	0 3 0.
5000 Phoenix, t, St. Linkinhorne		50 0 0	..	..	47 10 0.	7 0 0.	Oct. 1871
1772 Polperro, t, St. Agnes		15 0 0	..	..	1 7 0.	0 10 0.	Dec. 1871
2000 Polidice, t, c, Gwennap		10 0 0	..	3 1/2.	3 1/2 3	1 10 0.	0 9 0.
12800 Prince of Wales, c, Calstock		0 12 8	..	1/4.	1/4 1	0 10 0.	0 1 0.
1120 Provider Co., t, Up Lelant		10 6 7	27 1/2	26 27	103 2 0.	0 10 0.	Dec. 1871
1500 Queen, s, c, Calstock		10 0 0	..	..	0 9 0.	0 1 0.	Dec. 1871
12000 Roman Gravel, t, Salop		7 10 0	..	19	18 19	0 10 0.	0 5 0.
8869 Rosewall Hill & Hansom, t		4 0 0	..	1/2.	1/2 1/2	0 14 0.	0 1 0.
512 South Caradon, t, St. Cleer		1 5 0	240	220 240	678 10 0.	4 0 0.	Jan. 1871
612 South Condurrow, t, Camborne		5 5 6	9	8 8 2/4	2 2 0.	0 7 0.	Oct. 1871
6000 South Darron, t, Cardigan*		3 6 8	..	..	1 6 0.	0 1 0.	Nov. 1869
937 South Wheal Crofty, c, Illogan		21 10 10	47 1/2	45 47	3 0 0.	0 10 0.	June 1870
496 So. Wh. Frances, c, Illogan		18 18 9	67 1/2	62 70	274 18 2.	0 1 0.	Mar. 1868
242 Spears Moor, t, St. Just		36 17 9	50	18 18	16 15 0.	0 1 0.	June 1871
940 St. Ives Consols, t, St. Ives		10 15 9	15	13 15	0 10 0.	0 10 0.	Oct. 1871
8771 St. Just Amalgamated, t		3 10 0	..	..	0 9 0.	0 4 0.	Nov. 1871
12000 Tankerville, t, Salop		6 0 0	19	18 1/2	125 19	1 8 0.	0 6 0.
6000 Tincoif, t, Pool, Illogan		9 0 0	66	62 65	34 18 6.	2 0 0.	Nov. 1871
4000 Trumpet Cons., t, Helston		15 15 6	17	16 17	8 1 0.	0 10 0.	Jan. 1872
15000 Van, t, Llandilo		4 5 0	80	45 50	5 18 6.	0 12 0.	Dec. 1871
3000 W. Oliverton, t, Perranzabuloe		10 0 0	14	14 15	50 7 6.	1 0 0.	June 1871
2048 West Wheal Frances, t, Illogan		26 13 9	85	92 22	2 17 6.	0 15 0.	Jan. 1871
400 W. Wheal Seton, c, Camborne		47 0 0	140	120 150	70 10 0.	9 2 0.	Dec. 1871
2288 Wheal Arthur, t, Calstock		1 0 0	..	1/6.	0 3 0.	0 1 0.	Dec. 1871
512 Wheal Base, t, Illogan		5 2 8	130	125 125	636 0 0.	2 0 0.	Dec. 1871
5179 Wheal Grenville, t, Camborne		7 14 6	93 1/2	94 9 3/4	0 6 0.	0 4 0.	Dec. 1871
812 Wheal Jane, t, St. Eoa		10 15 6	50	48 50	26 0 0.	0 10 0.	Jan. 1872
4295 Wheal Kitty, t, St. Agnes		5 4 6	14	13 14	7 8 0.	0 10 0.	Nov. 1871
1024 Wheal Kitty, t, Up Lelant		3 10 8	..	..	14 2 6.	0 5 0.	Jan. 1872
896 Wheal Margaret, t, Illogan		13 17 6	..	14 16	81 2 3.	0 15 0.	Nov. 1871
1024 Wheal Mary Ann, t, Menheniot		10 0 0	12 1/2	12 13	72 17 6.	0 10 6.	Aug. 1871
1000 Wh. Mary Hutchings, Plym., t		2 12 6	..	..	1 5 6.	0 7 6.	Dec. 1871
80 Wheal Owes, t, St. Just		70 0 0	..	..	498 0.	0 8 0.	Nov. 1871
12000 Wheal Russell, t, Tavistock		1 0 0	..	..	0 2 0.	0 1 0.	June 1871
4096 Wheal Uny, t, c, Redruth		10 14 6	7 1/2	7 1/2	0 19 0.	0 4 0.	Jan. 1872
71000 Wicklow, t, c, Wicklow		2 10 0	137 1/2	137 1/2	50 2 0.	0 2 0.	Sept. 1871

## FOREIGN DIVIDEND MINES.

Shares.	Mines.	Paid.	Last Pr.	Clos. Pr.	Last Call.
85000 Alamillos, t, Spain*		2 0 0	..	1 1/2 2	0 16 9.
120000 Almada and Thito Consolidated, s-l..		1 0 0	..	2% 1	0 6 0.
20000 Australian, c, South Australiat		7 7 6	..	15% 15% 18%	0 2 0.
16000 Cape Copper Mining*		7 0 0	..	15% 17% 18%	0 5 0.
20000 Central American Association*		0 15 0	..	..	0 0 0.
21000 Colorado Terrible, s-l, Colorado*		5 0 0	..	43% 45% 54%	0 8 0.
76162 Don Pedro, North del Rey*		0 14 9	..	2% 24% 25%	0 4 0.
22500 Eberhardt and Aurora, s, Nevada*		10 0 0	..	9% 8% 9%	0 2 0.
80000 Emma, g, s, Utah (25,000 fully paid)		20 0 0	2 pm.	18 20	0 12 0.
70000 English and Australian, c		2 10 0	..	..	0 0 0.
25000 Fortune, t, Spain*		2 0 0	..	3 1/2 3 1/2	0 8 0.
80000 Kapunda Mining Co., Australiat ..		1 3 0	..	75% 76	